

INVT Power System (Shenzhen) Co.,LTD

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Stock code: 002334







## **INVT Power System**

**Power Solution Specialist** 









#### About us

INVT Power, a key high-tech company, subsidiary company of INVT Group (Stock code: 002334), is the leading total power solution provider in China.

Over the past years, we are being dedicated to providing high quality products and service to global customers. So far, we have gained more than 1300 patents and our customers and partners are from more than 80 countries and areas in government, finance, internet, communication, traffic, electric and industry. With the high quality and top-class services, we are adding values to all our customers.

We aim at offering fast customized solutions to our customers and continuous innovation for more competitive products and services.

Warmly welcome to be our distributor and partner. Meanwhile, we can provide OEM and ODM production and service for the clients all around the world.



Shenzhen Industrial park



Suzhou Industrial park



Fuyong production base







### How we make difference

#### Research and Innovation

- 12 Research centers
- 13% sales revenue for research and innovation
- IPD integrated products development system
- TUV witness Qualification LAB in Power Industry
- 1300 Intellectual Property Right,30% more than average level













- TUV Witness Qualification LAB
- UL Witness Qualifications LAB



Safety Lab



Components Test Lab



EMC Lab



Climate Environment Lab



Mechanical Environment Lab



Equipment Development Lab



Performance Test Lab



Dust-proof and Water-proof Lab



UPS R&D Lab



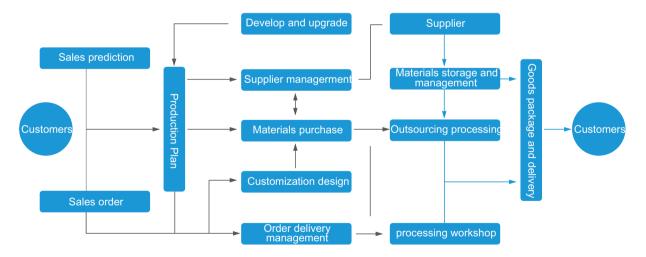




#### Production Management System

INVT Power ensures high quality products and fast response to our customers by applying advanced Supply Chain Management System based on Quality Control Management, Delivery Management, Service and Strategic Control System.

INVT applies Standardized Operational System. We standardizes the operational process for production, ensuring effectiveness, quality and cost control.



#### High Efficiency Supply

INVT Power adopts the most advanced international production mode as ISCM, JIT and LEAN, ensuring high efficiency and fast supply.





A state-level Hi-tech enterprise

National outstanding energy-saving enterprise

Famous brand of Guangdong province

Top 100 independent innovation enterprise

Top 10 China customer satisfaction brand

Procurement finalists brand by central governments









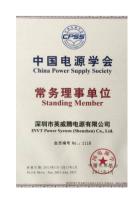
















## RM Series Modular Online UPS 40-600kVA (380V/400V/415V)

The RM series modular, online UPS ranging from 40kVA to 600kVA is designed to protect any critical load for medium and large data center achieving maximum availability. The RM series features the latest technology of 3-level technology and PFC input control, which guarantees high efficiency of 96% and ultra-reliability. Its compact design ensures power density of 600kVA in one cabinet, 3 units can be paralleled for capacity or redundancy up to 1500kVA, making it an excellent choice for medium and large facilities.







#### Features

## Compact design 600kVA in one cabinet, footprint less than

1.45m², saving valuable room space

#### High power density 50kVA power module in 4U height, easy for capacity expansion

#### High efficiency

Advanced 3-level technology guarantees high efficiency operating in double conversion mode up to 96%

# Intelligent charging management The system intelligently control the whole process of the charging and discharging, effectively improve the life time of the battery

#### High scalability

The system can be configured from 40kVA to 600kVA in one single cabinet, 3 units in parallel for a capacity up to 1500kVA

#### Friendly HMI

10.4" touch color LCD with graphic display, independent LCD for each power module

#### Smart sleep function

System can intelligently shutdown some power modules to increase total load rate, achieving higher efficiency

#### Multi communication interface Provide RS232, RS485, USB, SNMP, AS400 and programmable dry contacts

#### Specification

MODEL		RM600/50X	RM500/50X	RM400/50X	RM300/50X	RM200/50X	RM100/50X	RM240/40X	RM160/40X	RM080/40X					
System Capacity		600kVA	500kVA	400kVA	300kVA	200kVA	100kVA	240kVA	160kVA	80kVA					
Power Module Capacity		50kVA/50kW 40kVA/40kW													
	Dual Input		Standard Optional Standard												
	Phase		3 Phases + Neutral + Ground, 380/400/415VAC (line-line)												
Input	Input Voltage Range		304~478Vac (Line-Line),full load 228V~304Vac (line-line),load decrease linearly according to the min phase voltage												
	Rated Frequ	ency					50/601	Ηz							
	Input Freque	ncy Range					40Hz~7	'0Hz							
	Input PF						>0.99	)							
	Input THDi					<3%	(100% Lir	near Load	d)						
	Rate Voltage		380/400/415VAC (Line-Line)												
	Rate Frequency		50/60Hz												
	Input Voltage Range		Settable, -40% ~ +25%												
Bypass	Input Frequency Range		Settable, ±1Hz, ±3Hz, ±5Hz												
	Bypass Over	·load	110%~	125% last t	erm operation for more that for more that	n 5min	<130%, fo	ong time or 10 mins for 1 min	110% long term 125% for 5mins 150% for 1min	125%, lo 130%, for 1 150%, fo	0 minutes				
	Rated Inverter Voltage		380/400/415VAC (Line-Line)												
	Voltage Regulation		1% for balance load; 1.5% for unbalance load												
	Rate Frequency		50/60Hz												
Output	Frequency Precision		0.1%												
Output	Output PF		1												
	Output THDu		<1% linear load; <5.5% non-linear load												
	Crest Factor		3:1												
	Inverter Over	rload	<	<110% fc	r 1 hour;	125% for	10mins;1	50% for 1	1min;>150%	in;>150% for 200ms					
	Battery Rate Voltage		±240VDC												
	Battery Number		40pcs (settable: even number from 32 to 44)												
Battery	Voltage Pred	cision					1%			,					
	Charger Pow	ver				up to 20	% *Outpu	t active po	ower						
	Battery Cold	Start		Star	dard		Opti	onal	Standard	Opt	inal				
	Efficiency			F	AC Mode	: 96% EC	O Mode:	99% Batte	ery Mode: 96°	%					
	Display		10.4" (240-600kVA) or 7" (80-200kVA) touch screen LCD + LED+ Keyboard												
	IP Class		IP20												
	Interface		RS232, RS485, USB, Programmable dry contact												
System	Option		SNMP, Parallel kit, SPD, Dust Filter, LBS												
Cystom	Temperature		Operation: 0 ~ 40 °C Storge: -40 ~ 70 °C												
	Relative Humidity		0 ~ 95% Non condencing												
	Altitude		<1000m, Load derated 1% per 100m From 1000 ~ 2000m												
	Noise (1 meter)		72dB @ 100% load, 69dB @ 45% load												
	Applicable S								rformance: IE						
		Cabinet	1040	900	700	490	350	210	490	350	210				
Physical		Power module				15	050*000	000+000	050*1005	44	000+000				
	Dimension W*D*H (mm)	Cabinet Power module	1300*11	00*2000	1050*1000*2 000	650*1095 *2000	650*960 *1600	600*980 *1150	650*1095 *2000	650*960 *1600 * <b>7.00*1.79</b>	600*980 *1150				
	= 11 (111111)	Power module			510^/	00*178			510	*700*178					

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## HT33 Series Tower Online UPS 60-500kVA (380V/400V/415V)

HT33 series three phase UPS offers advanced technology that increase performance and reliability: three high speed DSPs with completed digital control fully ensure high quality of power supply, high input power factor and low input current distortion. It also offers humanization design: full front access of serviceability and user friendly interface.





#### Application

- IDC(Internet Data center), ISP, IT Room, Service Center
- Precision instruments, Intelligent equipments

#### Features

- High efficiency, up to 96%
- High input PF > 0.99; Input current THDi < 3%
- Multi-protection, over-temperature protection with 8 sensors, over-load, battery under voltage, fan failures, short-circuit
- Battery cold start
- Battery management with smart charging control, greatly extend the battery life

- High power density
- Parallel up to 1500kVA
- Modular design of subsystem, convenient for field maintenance
- Friendly operation interface, color touch LCD screen

#### Specification

MODEL			HT33060X	HT33080X	HT33090X	HT33100X	HT33120X	HT33150X	HT33200X	HT33250X	HT33300X	HT33400X	HT33500X
System Capacity			60kVA	80kVA	90kVA	100kVA	120kVA	150kVA	200kVA	250kVA	300kVA	400kVA	500kVA
	Dual Input					Standar	·d			Opti	onal	Sta	ndard
Input	Phase		3 Phase+Neutral+Ground, 380V/400V/415V(line-line)										
	Input Voltage Range		304~478Vac (line-line),full load; 228V~304Vac (line-line),load decreases linearly according to the min phase voltage										
	Rate Frequ	uency						50/60H	Z				
	Input Frequency	uency Range					40	)Hz ~ 7(	)Hz				
	Input PF		>0.99										
	Input THD	i	<3% (100% Linear load)										
	Rate Voltage		380/400/415Vac (line-line)										
	Rate Frequency		50/60Hz										
	Input Voltage Range		Settable, -40% ~ +25%										
Bypass	Bypass Frequency Range		Settable, ±1Hz, ±3Hz, ±5Hz										
	Bypass Overload		125% long term operation 130% for 10 mins 150% for 1 min >150% for 300ms							110% long term operation 125% for 5 mins 150% for 1 min >150% for 1s			
	Rate Voltage		380/400/415Vac (line-line)										
	Voltage Regulation		1% for balance load; 1.5% for unbalance load										
	Rate Frequency		50/60Hz										
Output	Frequency Precision		0.1%										
Output	Output PF		1										
	Output THDu		<1% , Linear load; <5.5%, Non-linear load										
	Crest Factor		3:1										
	Inverter Overload		110% for 1 hour; 125% for 10 mins ;150% for 1 min; >150% for 200 ms										
	Voltage		$\pm 240  extsf{Vdc}$										
	Battery Number		40pcs (Settable: even number from 32 to 44)										
Battery	Voltage Precision		±1%										
	Charge Power		up to 20% * Output active power										
	Battery Cold Start		Optional Standard										
	Efficiency	AC Mode	95%	96%	95%	96%	95%			9	6%		
		ECO Mode						99%					
		Battery Mode	95%	96%	95%	96%	95%				6%		
	Display		10.4"(240kVA-500kVA) or 7"(60kVA-200kVA) touch screen LCD + LED + keyboard										
	IP Class		IP 20										
System	Interface		RS232, RS485, Programmable Dry Contact, USB										
Cycle	Option		SNMP Card, Parallel kit, SPD, LBS, Dust filter										
	Temperature		Operation: 0 ~ 40 °C Storge: -40 ~ 70 °C										
	Relative Humidity		0~95% Non-condensing										
	Altitude		<1000m. Within 1000m to 2000m, 1% power derating for every 100m rise										
	Noise (1 meter)		65dB @ 100% load, 62dB @ 45% load										
	Applicable Standards		Safety: IEC/EN 62040-1 EMC: IEC/EN 62040-2 Performance: IEC/EN 62040-3										
Physical	Weight (kg)		170	210	231	210	266	305	350	445	490	700	900
	Dimension W*D*H (mm)		600*980 *950	600*980 *1150	600*980 *1400	600*980 *1150	600*980 *1400	650*960 *1600	650*960 *1600	650*970 *2000	650*970 *2000	1050*1000 *2000	1300*1100 *2000

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## HT11 Series Tower Online UPS 6-20kVA (220V/230V/240V)

HT11 series, ranging from 6kVA to 20kVA, is double conversion online UPS with fully DSP controlled technology. The single phase UPS applies the advanced 3-level technology, achieving a efficiency up to 95%. With its compact design of high power density (kW=kVA), HT11 series makes it ideal choice for computers, telecommunication equipment and other sensitive devices.





#### Application

IDC(Internet Data Center), network, servers and workstations, office etc

#### Features 1

- High efficiency, up to 95%
- kVA=kW, Output PF=1
- 3 level of technology, compatible with complicated load
- Battery number can be set on LCD

- Intelligent charging management, effectively improving the life time of battery
- Smaller size with higher power density
- Parallel up to 4 units
- 12A charger for option, charging for large capacity batteries

#### Specification

MODEL	HT1106XS	HT1106XL	HT1110XS	HT1110XL	HT1115XL	HT1120XL						
Capacity	6kVA/6kW	6kVA/6kW	10kVA/10kW	10kVA/10kW	15kVA/15kW	20kVA/20kW						
Phase		S	Single phase in,	Single phase ou	ıt							
	110Vac~288Vac											
Input voltage range	100% load@ > 176Vac; 90% load@ > 160Vac 80% load@ > 140Vac; 60% load@ > 110Vac											
Input THDi	≤4%@100% load; ≤6%@50% load (linear load)											
Input PF	≥0.99											
Input frequency range	40Hz-70Hz											
Output PF	1											
Output voltage	220V/230V/240V											
Voltage regulation	±1%											
THDu		≤2%(linear); ≤	≤1%(linear); ≤3% (non-linear)									
Battery voltage	192Vdc											
Battery type/number	12V, 7Ah*16	External	12V, 9Ah*16	External	External							
System efficiency			Normal m	ode: 95%								
Noise(1 meter away)		<48dB@< <58dB@3	<50dB@<70%load; <58dB@>70%load									
Overload capability (Inverter mode)			110%: for 10 mir 150%: for		•							
Overload capability (Battery mode)			own after 1 min; 130%: shut dowr		n after 10 sec;							
Crest factor	3:1											
Display	LED+LCD											
Interface	Standard:RS232 Optional: SNMP, USB, RS485, Dry Contacts, Parallel Kit											
W*D*H (mm)	190*426*705	190*426*336	190*485*705	190*485*336	190*485*480							
Package Weight (kg)	56	14	60	16	33							

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