

## DATASHEET Three-Phase Hybrid Series KY- EST-06KH/08KH/10KH/12KH/15KH/17KH/20KH

Model	6-10KW Three-Phase Hybrid	KY-EST06KH	KY-EST08KH	KY-EST10KH		
Efficiency	Max.Efficiency	KI EBIOOKI	>98.2%	IXT EST TOK		
PV Input and Output	Max. PV input power(W)	7800	10400	13000		
	Max. PV input voltage(V)	1	1000	1.5555		
	MPP Operation Voltage Range(V)	+	180-900			
	No. of MPPTs	<del> </del>	2			
	Max. number of PV strings per MPPT	1/1	1/1	1/1		
	Max. PV input current(A)	12.5/12.5				
	Short-circuit current of PV input(A)	<u> </u>	13.5/13.5			
	Start up voltage(V)	13.5/13.5	180			
Battery Input	Max Input/Output Voltage(V)		550			
	Operating Voltage Range(V)		180-550			
	Max Charge/Discharge Current(A)					
		6000/6000	25/30	10000/1000		
	Max Input/Output Power(W)	6000/6000	8000/8000	10000/1000		
	Battery Type		Li-ion/Lead-aci	a r		
	Rated Power(W)	6000	8000	10000		
	Max. Apparent AC Power(VA)	6000	8000	10000		
	Nominal AC Voltage(Vac)		400/380,3L/N/PE			
A.C. Immediate of Contract	AC Power Frequency(Hz)		50/60			
AC Input and Output	Max. AC Output Current(A)	10	12	15		
	Rated Current Output(A)	10	12	15		
	Power Factor Range	~1 (Adjustable	~1 (Adjustable from 0.8 leading to 0.8 laggin			
	OutputTHDi(@Nominal Output)	•	<3%			
Off-Grid AC Output(Back-up AC Output )	Rated Output Power(W)	6000	8000	10000		
	Max. Apparent AC Output Power(VA)	6000	8000	10000		
	Nominal AC Output Voltage(Vac)		400/380,3L/N/PE			
	AC Power Frequency(Hz)		50/60			
	Max. AC Output Current(A)	10	12	15		
Genaral Data	Operating Temperature Range	-25°C	+60°C(>45°C d	derating)		
	Operating Altitude(m)		<4000			
	Noise(dB)		<40			
	Topology		Transformerless			
	Cooling Method	T I	Natural convection			
	Ingress Protection Rating		IP65			
	Protective class		Class 1			
	Overvoltage Category	OVCII	OVCII(PV)(Battery), OVCIII(AC )			
	Active anti-Islanding method		RoCoF			
	Relative Humidity	0-1	0-100%, no condensation			
	DC Connection Type		MC/Amphenol/Phoenix			
	AC Connection Type		Plug-in Connector			
	Display		LCD			
	Communication With Portal	RS41	RS485 (WiFi/GPRS Optinal)			
	Communication With BMS	1,340	CAN			
	Communication With Meter		RS485			
		\\\				
	Mounting Method	- VV	Wall-mounting bracket			
	Dimensions (W*H*D)(mm)	- 22	505*570*220			
	Weight(Kg)	23	23 JEC62100 173	24		
Contification	Safety	ENICA	IEC62109-1/-2			
Certification	EMC	EN610	EN61000-6-1/-2/-3,IEC61000 AS4777.2,NRS097-2-1:2017			
	On-Grid standard	A C 47	77.2 NIDC007.2			



## DATASHEET Three-Phase Hybrid Series KY- EST-06KH/08KH/10KH/12KH/15KH/17KH/20KH

Model		IVV_CCT12VII	IVV_CCT1CI/II	LAN ECTIANI	IVV_ECTANIZE		
	May Efficiency	KY-EST12KH	KY-EST15KH	KY-EST17KH	KY-EST20KH		
Efficiency	Max.Efficiency	15000	,	3.2%	2000		
PV Input	Max. PV input power(W)	15600	19500	22100	26000		
	Max. PV input voltage(V)		1000				
	MPP Operation Voltage Range(V)	180-900					
	No. of MPPTs	2					
	Max. number of PV strings per MPPT	1/1	2/1	·			
	Max. PV input current(A)	12.5/12.5	12.5/23	23/23			
	Short-circuit current of PV input(A)	13.5/13.5	13.5/25 25/25				
	Start up voltage(V)	180					
Battery	Max Input/Output Voltage(V)	700					
	Operating Voltage Range(V)	180-700					
	Max Charge/Discharge Current(A)	50/50					
	Max Input/Output Power(W)	12000/12000	15000/15000	17000/17000	20000/2000		
	Battery Type		Li-ion/L	ead-acid			
AC Input and Output	Rated Power(W)	12000	15000	17000	20000		
	Max. Apparent AC Power(VA)	12000	15000	17000	20000		
	Nominal AC Voltage(Vac)		400/380	,3L/N/PE	•		
	AC Power Frequency(Hz)		50/60				
	Max. AC Output Current (A)	18	22	25	31		
	Rated Current Output(A)	18	22	25	31		
	Power Factor Range	~1 (Ad	~1 (Adjustable from 0.8 leading to 0.8 lagging)				
	OutputTHDi(@Nominal Output)	<3%					
Off-Grid AC Output (Back-up AC Output )	Rated Output Power(W)	12000	15000	17000	20000		
	Max. Apparent AC Output Power(VA)	12000	15000	17000	20000		
	Nominal AC Output Voltage(Vac)	400/380,3L/N/PE					
	AC Power Frequency(Hz)	50/60					
	Max. AC Output Current(A)	18	22	25	31		
	Operating Temperature Range		-25°C +60°C(	⊥ >45°C derating)			
	Operating Altitude(m)		<4000				
	Noise(dB)		<45				
Genaral D <i>a</i> ta	Topology		Transformerless				
	Cooling Method		Intelligent Fan				
	Ingress Protection Rating		IP65				
	Protective class		Class 1				
	Overvoltage Category		OVCII(PV)(Battery), OVCIII(AC )				
	Active anti-Islanding method		RoCoF				
			0-100%, no condensation				
	Relative Humidity  DC Connection Type		MC/Amphenol/Phoenix				
			1 1 1				
	AC Connection Type		Plug-in Connector				
	Display		LCD				
	Communication With Portal	RS485 (WiFi/GPRS Optinal)					
	Communication With BMS		CAN				
	Communication With Meter		RS485				
	Mounting Method	Wall-mounting bracket					
	Dimensions (W*H*D)(mm)	<b>_</b>	,	30*220	,		
	Weight(Kg)	26	27	27	28		
	Safety	IEC62109-1/-2					
		EN61000-6-1/-2/-3,IEC61000					
	EMC		EN61000-6-1/	-2/-3,IEC61000			
	EMC On-Grid standard			-2/-3,IEC61000 5097-2-1:2017			