



# DATASHEET

## Three-Phase Hybrid /AC Inverter

H3-Pro-15.0 / 20.0 / 22.0 / 24.9 / 25.0 / 29.9 / 30.0  
AC3-Pro-15.0 / 20.0 / 22.0 / 24.9 / 25.0 / 29.9 / 30.0

# H3 PRO SERIES

## Three-Phase Hybrid /AC Inverter



Fox ESS storage solutions are available with advanced and intuitive app based remote control and monitoring functionality.



### Easy Installation

Flexible configuration, plug and play set-up, built-in fuse protection.



### High Voltage

Includes high-voltage batteries for maximum round-trip efficiency.



### IP65 Rated

Engineered to last with maximum flexibility. Suitable for outdoor installation.



### Remote Monitoring

Monitor your system remotely via smartphone app or web portal.



REFINED – POWERFUL – FLEXIBLE

## BATTERY EXPANSION EASY UPGRADE



Easily expand your system by adding extra batteries. There are three battery series you can choose from, which enables a storage capacity of up to 83.88 kWh. A max. of 10 storage inverters can be connected in parallel which allows you to enlarge the system scale based on different installation requirements.

For more information about the Fox ESS range, visit: [www.fox-ess.com](http://www.fox-ess.com)



# TECHNICAL SPECIFICATIONS

HYBRID INVERTER MODEL: AC INVERTER MODEL:	H3-Pro-15.0 AC3-Pro-15.0	H3-Pro-20.0 AC3-Pro-20.0	H3-Pro-22.0 AC3-Pro-22.0	H3-Pro-24.9 AC3-Pro-24.9	H3-Pro-25.0 AC3-Pro-25.0	H3-Pro-29.9 AC3-Pro-29.9	H3-Pro-30.0 AC3-Pro-30.0
<b>PV INPUT(ONLY FOR HYBRID)</b>							
Max. Recommended DC Power [W] <sup>[1]</sup>	22500	30000	33000	37500	37500	45000	45000
Max. DC Voltage [V] <sup>[2]</sup>				1000			
Normal DC Operating Voltage [V]				750			
Max. Input Current [A]	32	32	32	32	32	32	32
Max. Short Circuit Current [A]	40	40	40	40	40	40	40
MPPT Voltage Range [V]				150 ~ 850			
MPPT Voltage Range [V] (full load)	170 ~ 850	230 ~ 850	250 ~ 850	280 ~ 850	280 ~ 850	340 ~ 850	340 ~ 850
Start-up Voltage [V]				160			
No. of MPP Trackers				3			
Strings Per MPP Tracker	2/2/2	2/2/2	2/2/2	2/2/2	2/2/2	2/2/2	2/2/2
Max. Inverter Backfeed Current to the Array				0			
<b>BATTERY</b>							
Battery Type				Lithium Battery			
Battery Voltage [V]				150 ~ 800			
Full AC Load Battery Voltage [V]	160 ~ 790	220 ~ 790	240 ~ 790	270 ~ 790	270 ~ 790	330 ~ 790	330 ~ 790
Max. Charge/ Discharge Current [A]	50+50	50+50	50+50	50+50	50+50	50+50	50+50
Number of Battery Input	2	2	2	2	2	2	2
Communication Interface				CAN			
<b>AC OUTPUT</b>							
Normal AC Power [VA]	15000	20000	22000	24900	25000	29900	30000
Max. Apparent AC Power [VA]	16500	22000	24200	24900	27500	29900	33000
Rated Grid Voltage (AC Voltage Range) [VAC]				400 / 230 ; 380 / 220 , 3L / N / PE			
Rated Grid Frequency [Hz]				50 / 60 , ±5			
Max. AC Current [A] (Per Phase)	25.0	33.3	36.7	37.7	41.7	45.4	50.0
Power Factor				1(Adjustable from 0.8 Leading to 0.8 Lagging)			
Export Control				YES			
THDI [%]				<3 @Rated Power			
<b>AC INPUT</b>							
Max. AC Power [VA]	22500	30000	33000	35000	35000	35000	35000
Rated Grid Voltage (AC Voltage Range) [V]				400 / 230 ; 380 / 220 , 3L / N / PE			
Rated Grid Frequency [Hz]				50 / 60 , ±5			
Max. AC Current [A] (Per Phase)	34.1	45.5	50.0	53.0	53.0	53.0	53.0
Power Factor				1(Adjustable from 0.8 Leading to 0.8 Lagging)			
<b>EPS OUTPUT</b>							
Max Apparent AC Power [VA]	15000	20000	22000	25000	25000	30000	30000
Peak Apparent AC Power [VA] (60s)	18000	24000	26400	30000	30000	36000	36000
Rated Output Voltage [V]				400 / 230 ; 380 / 220 , 3L / N / PE			
Rated Grid Frequency [Hz]				50 / 60			
EPS Max Current [A] (Per Phase)	22.7	30.3	33.3	37.9	37.9	45.5	45.5
Power Factor				1(Adjustable from 0.8 Leading to 0.8 Lagging)			
Parallel Operation				Yes @Max10PCS			
Switch Time [ms]				<20			
THDV [%]				<3 @Rated Power			
<b>EFFICIENCY</b>							
MPPT Efficiency [%]	99.90	99.90	99.90	99.90	99.90	99.90	99.90
Max. Efficiency [%]	97.80	97.80	97.80	97.80	97.80	97.80	97.80
Max. Battery to AC Efficiency [%]	97.60	97.60	97.60	97.60	97.60	97.60	97.60
Max. PV to Battery Efficiency [%]	98.10	98.10	98.10	98.10	98.10	98.10	98.10
Euro-Efficiency [%]	97.30	97.40	97.40	97.40	97.40	97.40	97.40
<b>PROTECTION</b>							
PV Reverse Polarity Protection				YES			
Batter Reverse Protection				YES			
Anti-Islanding Protection				YES			
Output Short Protection				YES			
Leakage Current Protection				YES			
Insulation Resistor Detection				YES			
Over Voltage Category				III (AC Side) , II (DC Side)			
Reverse Connect Protection				YES			
Over-current Protection / Over-temperature Protection				YES			
AC/DC Surge Protection				Type II/Type II			
AFCI Protection				Optional			
DC SWITCH				Optional			
String Monitoring Function				Optional			
<b>GENERAL DATA</b>							
Dimension (WxHxD) [mm]				600*560*225			
Dimension of Packing (WxHxD) [mm]				720*680*370			
Net Weight [kg]				52.5			
Gross Weight [kg]				57.5			
Installation				Wall-mounted			
Operating Temperature Range [°C]				-25 ~ +60 (Derating at 45)			
Storage Temperature [°C]				-40 ~ +70			
Noise Emission (typical) [dB]	<45	<45	<60	<60	<60	<60	<60
Storage/Operation Relative Humidity [%]				0 ~ 95 (Without Condensation)			
Altitude [m]				<4000			
Protective Class				I			
Ingress Protection				IP65 (for Outdoor Use)			
Standby Consumption [W]				200 for Hot Standby , 18 for Cold Standby			
Idle Mode				YES			
Cooling				Smart FAN Cooling			
Inverter Topology				Non-isolated			
Communication Interface				Meter, WIFI, 4G(optional), DRM, USB, BMS(CAN), RS485			
LCD Display				Backlight 16*4 Character			
Button				Capacitive Touch Sensor *4			
Buzzer				1, Inside (EPS&Earth Fault)			
<b>STANDARD COMPLIANCE MORE AVAILABLE UPON REQUEST</b>							
Safety				EN 62109-1, EN 62109-2			
EMC				IEC 61000-6-2, IEC 61000-6-3			

\*More technical characteristics are available on demand and customized.

[1] Per MPP max. PV input power 15kW.

[2] For 1000V system, Maximum operating voltage is 950V. PV input voltage greater than 955V, PV overvoltage error will be reported.