



## Three Phase Inverters for the 277/480V Grid for North America

SE30KUS / SE33.3KUS



INVERTERS

### The best choice for SolarEdge enabled systems

- Specifically designed to work with power optimizers
- Quick and easy inverter commissioning directly from a smartphone using the SolarEdge SetApp
- Superior efficiency (98.5%)
- Integrated arc fault protection and rapid shutdown for NEC 2014 and 2017, per article 690.11 and 690.12
- UL1741 SA certified, for CPUC Rule 21 grid compliance
- Built-in module-level monitoring
- Internet connection through Ethernet or Wireless
- Small, lightweight, and easy to install outdoors or indoors on provided bracket
- Fixed voltage inverter for longer strings
- Integrated Safety Switch
- Supplied with RS485 Surge Protection Device, to better withstand lightning events



# Three Phase Inverters for the 277/480V Grid<sup>(1)</sup> for North America

## SE30KUS / SE33.3KUS

	SE30KUS	SE33.3KUS	
<b>APPLICABLE TO INVERTERS WITH PART NUMBER</b>	<b>SEXXX-XXXXXBXX4</b>		
<b>OUTPUT</b>			
Rated AC Power Output	30000	33300	VA
Maximum AC Power Output	30000	33300	VA
AC Output Line Connections	3 phase, 4-wire / PE (L1-L2-L3-N), TN, TT		
AC Output Voltage Minimum-Nominal-Maximum <sup>(2)</sup> (L-N)	244-277-305		Vac
AC Output Voltage Minimum-Nominal-Maximum <sup>(2)</sup> (L-L)	422.5-480-529		Vac
AC Frequency Min-Nom-Max <sup>(2)</sup>	59.3 - 60 - 60.5		Hz
Max. Continuous Output Current (per Phase)	36.5	40	A
GFDI Threshold	1		A
Utility Monitoring, Islanding Protection, Country Configurable Set Points	Yes		
THD	≤ 3		%
<b>INPUT</b>			
Maximum DC Power (Module STC)	40500	45000	W
Transformer-less, Ungrounded	Yes		
Maximum Input Voltage DC to Gnd	490		Vdc
Maximum Input Voltage DC+ to DC-	1000		Vdc
Nominal Input Voltage DC to Gnd	420		Vdc
Nominal Input Voltage DC+ to DC-	840		Vdc
Maximum Input Current	39	40	Adc
Maximum Input Short Circuit Current	45		Adc
Reverse-Polarity Protection	Yes		
Ground-Fault Isolation Detection	350kΩ Sensitivity <sup>(3)</sup>		
CEC Weighted Efficiency	98.5		%
Night-time Power Consumption	< 4		W
<b>ADDITIONAL FEATURES</b>			
Supported Communication Interfaces	2 x RS485, Ethernet, Built-in GSM (optional)		
Inverter Commissioning	With the SetApp mobile application using built-in Wi-Fi station for local connection		
Rapid Shutdown – NEC 2014 and 2017 690.12	Automatic Rapid Shutdown upon AC Grid Disconnect		
RS485 Surge Protection	Supplied with the inverter		
Smart Energy Management	Export Limitation		
<b>STANDARD COMPLIANCE</b>			
Safety	UL1741, UL1741 SA, UL1699B, CSA C22.2, Canadian AFCI according to T.I.L. M-07		
Grid Connection Standards	IEEE1547, Rule 21, Rule 14 (HI)		
Emissions	FCC part15 class B		
<b>INSTALLATION SPECIFICATIONS</b>			
AC output conduit size / AWG range	3/4" minimum / 8-4 AWG		
DC input conduit size / AWG range	3/4" minimum / 12-6 AWG		
Number of DC inputs	3 pairs <sup>(4)</sup>		
Dimensions (H x W x D)	21 x 12.5 x 10.5 / 540 x 315 x 260		in / mm
Dimensions with Safety Switch (H x W x D)	30.5 x 12.5 x 10.5 / 775 x 315 x 260		in / mm
Weight	99.5 / 45		lb / kg
Weight with Safety Switch	106 / 48		lb / kg
Cooling	Fans (user replaceable)		
Noise	< 55		dB(A)
Operating Temperature Range	-40 to +140 / -40 to +60 <sup>(5)</sup>		
Protection Rating	NEMA 3R		

<sup>(1)</sup> For 120/208V inverters refer to: <http://www.solaredge.com/files/pdfs/products/inverters/se-three-phase-us-inverter-208V-datashet.pdf>

<sup>(2)</sup> For other regional settings please contact SolarEdge support

<sup>(3)</sup> Where permitted by local regulations

<sup>(4)</sup> Field replacement kit for 1 pair of inputs P/N: DCD-3PH-1TBK; Field replacement kit for 3 pairs of fuses and holders P/N: DCD-3PH-6FHK-S1

<sup>(5)</sup> For power de-rating information refer to: <https://www.solaredge.com/sites/default/files/se-temperature-derating-note-na.pdf>



# RoHS