











Product information

Valid from 01.04.2015 until 31.12.2015





Contents

	Inverters without transformer FLX PRO	5
	Inverters without transformer Sunny Tripower Sunny Boy	9
	Micro Inverter	23
	SMART ENERGY	25
	Central inverters Sunny Central	34
	Central Inverter Stations	74
	Monitoring Systems System Monitoring	80
	Off-grid inverters Sunny Island	91



Description of the Symbols Used



This symbol indicates a specification of a product or an information which is important for correct ordering (e. g. differences in version). Please pay special attention to these sections in order to avoid incorrect ordering.



Exclusion of liability and Terms of delivery

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This price list replaces and renders invalid all previous prices.

Due to fluctuating exchange rates, SMA has the right to modify prices quarterly.

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**FLX PRO 17 kW inverter (139F2106)**

Valid from: as provided in contract

139F2106
(price before
options):

Solar inverter for grid feed-in, Pac,r/Sac. Max 17000 W/17000VA, three-phase feed-in, with reactive power supply, transformerless, graphic display, Country settings via display/integrated web server, Ethernet, RS485 communication, interface, 3 MPPT Inputs , IP65, DC SUNCLIX terminal, integrated DC-disconnector switch

specific price 1)

FLX PRO 15 kW inverter (139F2105)

Valid from: as provided in contract

139F2105
(price before
options):

Solar inverter for grid feed-in, Pac,r/Sac. Max 15000 W/15000VA, three-phase feed-in, with reactive power supply, transformerless, graphic display, Country settings via display/integrated web server, Ethernet, RS485 communication, interface, 3 MPPT Inputs , IP65, DC SUNCLIX terminal, integrated DC-disconnector switch

specific price 1)

Comments

1) Can vary depending on options.



Accessories



- 139F0272** Retrofit module for FLX inverters, integrated interfaces for temperature and irradiation sensors, SO input, relay output
- 139F0273** Retrofit module for FLX inverters for data transmission via GSM radio standard
- 139F0275** Retrofit module for FLX inverters, 6 digital inputs for power limitation or reactive power setpoint

Inverters without transformer





Sunny Tripower 25000TL (STP 25000TL-30)

Valid from: as provided in contract

STP 25000TL-30 (price before options):	xx	x	xx	x	x	Solar inverter for grid feed-in, Pac,r/max 25000 W/ 25000 VA, three-phase feed-in, maximum efficiency 98.3%, with reactive power supply, transformerless, rotary switch for language settings, Multi-String function, integrated DC disconnect switch, DC SUNCLIX terminal
specific price 1)						
Color of lid:	08					Gentian blue (additional colors on request)
Communication:		1				RS485
		2				Speedwire/Webconnect (Standard)
Documentation:			00			Language package (DE, EN, ES, FR, IT, NL, PT)
I/O port moduls:				0		Without (standard)
				1		Multi-function relay
				2		Power Control Module
DC overvoltage discharger:				0		Without DC overvoltage protector (type II) (Standard)
				2		With DC overvoltage protector (type II) for input A and B

Comments

1) Can vary depending on options.

Sunny Tripower 20000TL (STP 20000TL-30)

Valid from: as provided in contract

STP 20000TL-30 (price before options):	xx	x	xx	x	x	Solar inverter for grid feed-in, Pac,r/max 20000 W/ 20000 VA, three-phase feed-in, maximum efficiency 98.4%, with reactive power supply, transformerless, rotary switch for language settings, Multi-String function, integrated DC disconnect switch, DC SUNCLIX terminal
specific price 1)						
Color of lid:	08					Gentian blue (additional colors on request)
Communication:		1				RS485
		2				Speedwire/Webconnect (Standard)
Documentation:			00			Language package (DE, EN, ES, FR, IT, NL, PT)
I/O port moduls:				0		Without (standard)
				1		Multi-function relay
				2		Power Control Module
DC overvoltage discharger:				0		Without DC overvoltage protector (type II) (Standard)
				2		With DC overvoltage protector (type II) for input A and B

Comments

1) Can vary depending on options.



Sunny Tripower 15000TL (STP 15000TL-10)

Valid from: as provided in contract

STP 15000TL-10 (price before options):	x	xx	x	x	-	xx	Solar inverter for grid feed-in Pac,r/Sac,max 15000 W/ 15000 VA three-phase feed, with reactive power supply, transformerless, graphic display, rotary coded switch for country settings SMA Bluetooth® communication interface, Multi-String function, DC SUNCLIX terminal incl. Electronic Solar Switch (ESS)
specific price 1)							
Communication:	0 1 2						No add. Communication RS485 Speedwire/Webconnect
Color of lid:		08					Gentian blue (additional colors on request)
DC overvoltage discharger:			0 2				without DC overvoltage protector (type II) with DC overvoltage protector (type II) for input A and B
I/O port moduls:				0 1 2			Without (standard) Multi-function relay Power Control Module
Documentation:						00	Language package (DE, EN, ES, FR, IT, NL, PT)

Comments

1) Can vary depending on options.



Sunny Tripower 12000TL (STP 12000TL-20)

Valid from: as provided in contract

STP 12000TL-20 (price before options):	xx	x	-	xx	Solar inverter for grid feed-in Pac,r/Sac, max 12000 W/12000 VA three-phase feed-in, with reactive power supply, transformerless, graphic display, rotating selection switch for country settings SMA Bluetooth® and Speedwire/Webconnect communication interface, multifunctions relay, multi-string function, DC SUNCLIX terminal incl. Electronic Solar Switch (ESS)
specific price 1)					
Color of lid:	08				Gentian blue (additional colors on request)
I/O port moduls:	0				Without (standard)
	2				Power Control Module
Documentation:				00	Language package (DE, EN, ES, FR, GR, IT, PT, CZ, NL)

Comments

1) Can vary depending on options.

Sunny Tripower 10000TL (STP 10000TL-20)

Valid from: as provided in contract

STP 10000TL-20 (price before options):	xx	x	-	xx	Solar inverter for grid feed-in Pac,r/Sac, max 10000 W/10000 VA three-phase feed-in, with reactive power supply, transformerless, graphic display, rotating selection switch for country settings SMA Bluetooth® and Speedwire/Webconnect communication interface, multifunctions relay, multi-string function, DC SUNCLIX terminal incl. Electronic Solar Switch (ESS)
specific price 1)					
Color of lid:	08				Gentian blue (additional colors on request)
I/O port moduls:	0				Without (standard)
	2				Power Control Module
Documentation:				00	Language package (DE, EN, ES, FR, GR, IT, PT, CZ, NL)

Comments

1) Can vary depending on options.



Sunny Tripower 9000TL (STP 9000TL-20)

Valid from: as provided in contract

STP 9000TL-20 (price before options):	xx	x	-	xx	Solar inverter for grid feed-in Pac,r/Sac, max 9000 W/9000 VA three-phase feed-in, with reactive power supply, transformerless, graphic display, rotating selection switch for country settings SMA Bluetooth® and Speedwire/Webconnect communication interface, multifunctions relay, multi-string function, DC SUNCLIX terminal incl. Electronic Solar Switch (ESS)
specific price 1)					
Color of lid:	08				Gentian blue (additional colors on request)
I/O port moduls:	0				Without (standard)
	2				Power Control Module
Documentation:				00	Language package (DE, EN, ES, FR, GR, IT, PT, CZ, NL)

Comments

1) Can vary depending on options.

Sunny Tripower 8000TL (STP 8000TL-20)

Valid from: as provided in contract

STP 8000TL-20 (price before options):	xx	x	-	xx	Solar inverter for grid feed-in Pac,r/Sac, max 8000 W/8000 VA three-phase feed-in, with reactive power supply, transformerless, graphic display, rotating selection switch for country settings SMA Bluetooth® and Speedwire/Webconnect communication interface, multifunctions relay, multi-string function, DC SUNCLIX terminal incl. Electronic Solar Switch (ESS)
specific price 1)					
Color of lid:	08				Gentian blue (additional colors on request)
I/O port moduls:	0				Without (standard)
	2				Power Control Module
Documentation:				00	Language package (DE, EN, ES, FR, GR, IT, PT, CZ, NL)

Comments

1) Can vary depending on options.



Sunny Tripower 7000TL (STP 7000TL-20)

Valid from: as provided in contract

STP 7000TL-20 (price before options):	xx	x	-	xx	Solar inverter for grid feed-in Pac,r/Sac, max 7000 W/7000 VA three-phase feed-in, with reactive power supply, transformerless, graphic display, rotating selection switch for country settings SMA Bluetooth® and Speedwire/Webconnect communication interface, multifunctions relay, multi-string function, DC SUNCLIX terminal incl. Electronic Solar Switch (ESS)
specific price 1)					
Color of lid:	08				Gentian blue (additional colors on request)
I/O port moduls:	0				Without (standard)
	2				Power Control Module
Documentation:				00	Language package (DE, EN, ES, FR, GR, IT, PT, CZ, NL)

Comments

1) Can vary depending on options.

Sunny Tripower 6000TL (STP 6000TL-20)

Valid from: as provided in contract

STP 6000TL-20 (price before options):	xx	x	-	xx	Solar inverter for grid feed-in Pac,r/Sac, max 6000 W/6000 VA three-phase feed-in, with reactive power supply, transformerless, graphic display, rotating selection switch for country settings SMA Bluetooth® and Speedwire/Webconnect communication interface, multifunctions relay, multi-string function, DC SUNCLIX terminal incl. Electronic Solar Switch (ESS)
specific price 1)					
Color of lid:	08				Gentian blue (additional colors on request)
I/O port moduls:	0				Without (standard)
	2				Power Control Module
Documentation:				00	Language package (DE, EN, ES, FR, GR, IT, PT, CZ, NL)

Comments

1) Can vary depending on options.

**Sunny Tripower 5000TL (STP 5000TL-20)**

Valid from: as provided in contract

STP 5000TL-20 (price before options):	xx	x	-	xx	Solar inverter for grid feed-in Pac,r/Sac, max 5000 W/5000 VA three-phase feed-in, with reactive power supply, transformerless, graphic display, rotating selection switch for country settings SMA Bluetooth® and Speedwire/Webconnect communication interface, multifunctions relay, multi-string function, DC SUNCLIX terminal incl. Electronic Solar Switch (ESS)
specific price 1)					
Color of lid:	08				Gentian blue (additional colors on request)
I/O port moduls:	0 2				Without (standard) Power Control Module
Documentation:				00	Language package (DE, EN, ES, FR, GR, IT, PT, CZ, NL)

Comments

1) Can vary depending on options.

**Sunny Boy 6000TL (SB 6000TL-21)**

Valid from: as provided in contract

SB 6000TL-21 (price before options):	2 Solar inverter for grid feed-in, Pac,r/max 6000 W / 6000 VA, transformerless, with reactive power control, graphic display, rotary switch for country settings, SMA Bluetooth® communication interface, multifunctions relay, multi-string function, DC SUNCLIX terminal
specific price 1)	
Communication:	2 Speedwire/Webconnect

Comments

1) Can vary depending on options.

* Only available in Italy.



Sunny Boy 5000TL (SB 5000TL-21)

Valid from: as provided in contract

SB 5000TL-21 (price before options):	2	xx	4	x	x	-	xx	PV inverter for grid feed-in Pac,r/Sac, max 4600 W/ 5000 VA* transformerless, for reactive power feed-in, graphic display, rotary switch for country settings SMA Bluetooth® communication interface, multistring function, DC connection SUNCLIX, incl. Electronic Solar Switch (ESS)
specific price 1)								
Communication:	2							Speedwire/Webconnect
Color of lid:		00						red (additional colors on request)
ESS (DC switch):				0				Without
				1				With (Standard)
I/O port moduls:				0				Without (standard)
				1				Multi-function relay
				2				Power Control Module
Documentation:							00	Language package (DE, EN, ES, FR, GR, IT, PT, CZ, NL)

Comments

1) Can vary depending on options.

* with configuration according to VDE-AR-N 4105, limitation of Sac to max. 4600 VA.

Sunny Boy 4000TL (SB 4000TL-21)

Valid from: as provided in contract

SB 4000TL-21 (price before options):	2	xx	4	x	x	-	xx	PV inverter for grid feed-in Pac,r/Sac, max 4000 W/4000 VA transformerless, for reactive power feed-in, graphic display, rotary switch for country settings SMA Bluetooth® communication interface, multistring function, DC connection SUNCLIX, incl. Electronic Solar Switch (ESS)
specific price 1)								
Communication:	2							Speedwire/Webconnect
Color of lid:		00						red (additional colors on request)
ESS (DC switch):				0				Without
				1				With (Standard)
I/O port moduls:				0				Without (standard)
				1				Multi-function relay
				2				Power Control Module
Documentation:							00	Language package (DE, EN, ES, FR, GR, IT, PT, CZ, NL)

Comments

1) Can vary depending on options.



Sunny Boy 3600TL (SB 3600TL-21)

Valid from: as provided in contract

SB 3600TL-21 (price before options):	2	xx	4	x	x	-	xx	PV inverter for grid feed-in Pac,r/Sac; max 3680 W/3680 VA transformerless, for reactive power supply, graphic display, rotary code switch for country settings SMA Bluetooth® communication interface, multi-string function DC connection SUNCLIX, incl. Electronic Solar Switch (ESS)
specific price 1)								
Communication:	2							Speedwire/Webconnect
Color of lid:		00						red (additional colors on request)
ESS (DC switch):				0				Without
				1				With (Standard)
I/O port moduls:				0				Without (standard)
				1				Multi-function relay
				2				Power Control Module
Documentation:							00	Language package (DE, EN, ES, FR, GR, IT, PT, CZ, NL)

Comments

1) Can vary depending on options.

For devices with reduced AC nominal power, please order SB 3600TL-21/V 0165. The order options are the same as for the SB 3600TL-21.

Sunny Boy 3000TL (SB 3000TL-21)

Valid from: as provided in contract

SB 3000TL-21 (price before options):	2	xx	4	x	x	-	xx	PV inverter for grid feed-in Pac,r/Sac; max 3000 W/ 3000 VA transformerless, for reactive power feed-in, graphic display, rotary switch for country settings SMA Bluetooth® communication interface, multistring function, DC connection SUNCLIX, incl. Electronic Solar Switch (ESS)
specific price 1)								
Communication:	2							Speedwire/Webconnect
Color of lid:		00						red (additional colors on request)
ESS (DC switch):				0				Without
				1				With (Standard)
I/O port moduls:				0				Without (standard)
				1				Multi-function relay
				2				Power Control Module
Documentation:							00	Language package (DE, EN, ES, FR, GR, IT, PT, CZ, NL)

Comments

1) Can vary depending on options.



Sunny Boy 3000TL SINGLE TRACKER (SB 3000TLST-21)

Valid from: as provided in contract

SB 3000TLST-21 (price before options):	2	xx	4	x	x	-	xx	PV inverter for grid feed-in Pac,r/Sac; max 3 000 W/ 3 000 VA transformerless, for reactive power feed-in, graphic display, rotary switch for country settings SMA Bluetooth® communication interface, DC connection SUNCLIX, incl. Electronic Solar Switch (ESS)
specific price 1)								
Communication:	2							Speedwire/Webconnect
Color of lid:		00						red (additional colors on request)
ESS (DC switch):				0				Without
				1				With (Standard)
I/O port moduls:				0				Without (standard)
				1				Multi-function relay
				2				Power Control Module
Documentation:							00	Language package (DE, EN, ES, FR, GR, IT, PT, CZ, NL)

Comments

1) Can vary depending on options.

Sunny Boy 2500TL SINGLE TRACKER (SB 2500TLST-21)

Valid from: as provided in contract

SB 2500TLST-21 (price before options):	2	xx	4	x	x	-	xx	PV inverter for grid feed-in Pac,r/Sac; max 2500 W/ 2500 VA transformerless, for reactive power feed-in, graphic display, rotary switch for country settings SMA Bluetooth® communication interface, DC connection SUNCLIX, incl. Electronic Solar Switch (ESS)
specific price 1)								
Communication:	2							Speedwire/Webconnect
Color of lid:		00						red (additional colors on request)
ESS (DC switch):				0				Without
				1				With (Standard)
I/O port moduls:				0				Without (standard)
				1				Multi-function relay
				2				Power Control Module
Documentation:							00	Language package (DE, EN, ES, FR, GR, IT, PT, CZ, NL)

Comments

1) Can vary depending on options.

**Sunny Boy 2100TL (SB 2100TL)**

Valid from: as provided in contract

SB 2100TL (price before options):	C	0	0	x	4	x	-	xx	Solar inverter for grid feed-in Pac,r/Sac, max 1950 W/2100 VA transformerless, text display, DC SUNCLIX terminal,
specific price 1)									
Communication:	C								Speedwire/Webconnect
Color of lid:				0					red (additional colors on request)
ESS (DC switch):						0			Without
						1			With (Standard)
Documentation:								DE	German
								EN	English
								ES	Spanish
								FR	French
								GR	Greek
								IT	Italian
								CZ	Czech
								NL	Dutch

Comments

1) Can vary depending on options.



Sunny Boy 1600TL (SB 1600TL-10)

Valid from: as provided in contract

SB 1600TL-10 (price before options):	C	0	0	x	4	x	-	xx	Solar inverter for grid feed-in Pac,r/Sac, max 1600 W/1600 VA transformerless, text display, DC SUNCLIX terminal
specific price 1)									
Communication:	C								Speedwire/Webconnect
Color of lid:				0					red (additional colors on request)
ESS (DC switch):						0	1		Without With (Standard)
Documentation:									DE German EN English ES Spanish FR French GR Greek IT Italian CZ Czech NL Dutch

Comments

1) Can vary depending on options.

Sunny Boy 1300TL (SB 1300TL-10)

Valid from: as provided in contract

SB 1300TL-10 (price before options):	C	0	0	x	4	x	-	xx	PV inverter for grid feed-in Pac,r/Sac; max 1 300 W/ 1 300 W transformerless, text display, DC SUNCLIX terminal
specific price 1)									
Communication:	C								Speedwire/Webconnect
Color of lid:				0					red (additional colors on request)
ESS (DC switch):						0	1		Without With (Standard)
Documentation:									DE German EN English ES Spanish FR French GR Greek IT Italian CZ Czech NL Dutch

Comments

1) Can vary depending on options.

**Sunny Boy 1.5 (SB1.5-1VL-40)**

Valid from: as provided in contract

SB1.5-1VL-40 (price before options):	x xx	PV string inverter for single-phase grid feed-in, Pac,r/Sac, max 1.5kW/1.5kVA, transformerless, with integrated W-LAN and Speedwire/Webconnect communication interface, DC connection SUNCLIX, incl. DC disconnect
specific price 1)		
Color of lid:	0	Red RAL3020
Documentation:	00	Language package (DE, EN, ES, FR, IT, GR)

Comments

1) Can vary depending on options.

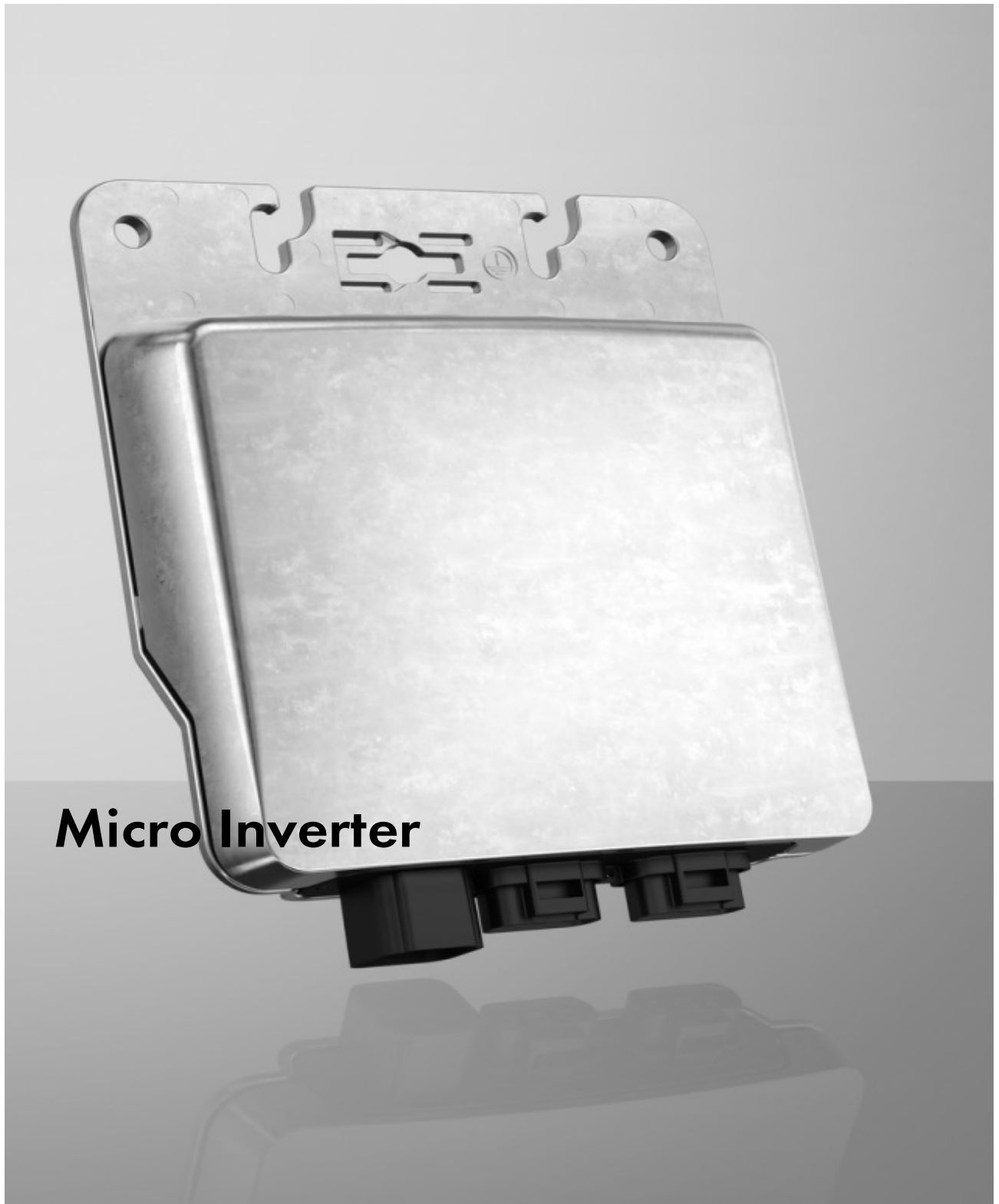
Sunny Boy 2.5 (SB2.5-1VL-40)

Valid from: as provided in contract

SB2.5-1VL-40 (price before options):	x xx	PV string inverter for single-phase grid feed-in, Pac,r/Sac, max 2.5kW/2.5kVA, transformerless, with integrated W-LAN and Speedwire/Webconnect communication interface, DC connection SUNCLIX, incl. DC disconnect
specific price 1)		
Color of lid:	0	Red RAL3020
Documentation:	00	Language package (DE, EN, ES, FR, IT, GR)

Comments

1) Can vary depending on options.



Micro Inverter



SB240-99-10	SMA micro inverters for grid feed-in, lid color untreated aluminum, $P_{ac,r}/S_{ac}$, max. 230 W/230 VA, HF transformer, minimum order quantity of six devices.
MULTIGATE-10	Power supply unit with integrated communication interface for SMA micro inverter, $P_{ac,r}/S_{ac}$, max. 2760 W/2760 VA
MI-ACCAB14-10	AC cables for connecting SMA micro inverters together, length 1.4 m. Packaging units of 24
MI-ACCAB20-10	AC cables for connecting SMA micro inverters together, length 2.0 m. Packaging units of 24
MI-ACCAP-10	AC protective cap for sealing the AC connection at the last SMA micro inverter. Packaging units of 200.
MI-ACCON-10	AC field plug for the connection between an SMA micro inverter and Sunny Multigate for external applications. Packaging units of 20
MI-DCMC4-10	DC-MC4 adapters for connecting SMA micro inverter to the PV module. Packaging units of 24
MI-DCTYCO-10	DC-TYCO adapters for connecting SMA micro inverter to the PV module. Packaging units of 24



SMART ENERGY




Sunny Boy 3600 Smart Energy (SB 3600SE-10)

Valid from: as provided in contract

SB 3600SE-10 (price before options):	xx PV inverter with integrated lithium-ion battery for grid feed-in Pac,r/Sac, max. 3,680 W/ 3,680 VA with reactive power supply, 2 kWh of usable battery capacity, transformerless, graphic display, rotary code switch for language settings Communication interface Speedwire/Webconnect, Multi-string function, DC connection SUNCLIX, integrated DC load-break switch
specific price 1)	
Documentation:	00 Language package (DE, EN, ES, FR, IT, PT, NL)

Sunny Boy 5000 Smart Energy (SB 5000SE-10)

Valid from: as provided in contract

SB 5000SE-10 (price before options):	xx PV inverter with integrated lithium-ion battery for grid feed-in Pac,r/Sac, max. 4600 W/5000 VA* with reactive power supply, 2 kWh of usable battery capacity, transformerless, graphic display, rotary code switch for language settings Communication interface Speedwire/Webconnect, Multi-string function, DC connection SUNCLIX, integrated DC load-break switch * with configuration in accordance with VDE-AR-N 4105, limitation of Sac, max to 4,600 VA.
specific price 1)	
Documentation:	00 Language package (DE, EN, ES, FR, IT, PT, NL)

Comments

1) Can vary depending on options.

For storage, transport and service of the battery inverter, specific liability terms and guidelines apply.



Integrated system solutions

ISS-SB3600SE-10-1	<p>SMA Integrated Storage System, Set 3600</p> <p>Set consisting of Sunny Boy 3600 Smart Energy, Sunny Home Manager with Bluetooth® + Speedwire, SMA radio-controlled socket and SMA Energy Meter</p> <p>Target country: Germany, Italy, Spain, Portugal, Netherlands, Greece; Austria</p>
ISS-SB3600SE-10-2	<p>SMA Integrated Storage System, Set 3600</p> <p>Set consisting of Sunny Boy 3600 Smart Energy, Sunny Home Manager with Bluetooth® + Speedwire, SMA radio-controlled socket and SMA Energy Meter</p> <p>Target country: France, Belgium, Czech Republic</p>
ISS-SB5000SE-10-1	<p>SMA Integrated Storage System, Set 5000</p> <p>Set consisting of Sunny Boy 5000 Smart Energy, Sunny Home Manager with Bluetooth® + Speedwire, SMA radio-controlled socket and SMA Energy Meter</p> <p>Target country: Germany, Italy, Spain, Portugal, Netherlands, Greece, Austria</p>
ISS-SB5000SE-10-2	<p>SMA Integrated Storage System, Set 5000</p> <p>Set consisting of Sunny Boy 5000 Smart Energy, Sunny Home Manager with Bluetooth® + Speedwire, SMA radio-controlled socket and SMA Energy Meter</p> <p>Target country: France, Belgium, Czech Republic</p>



Sunny Boy/Sunny Tripower Demo

SB 5000TL-2Z (price before options):	x	xx	x	Demo device SB 3000TL-21, SB 3600TL-21, SB 4000TL-21, SB 5000TL-21, SB 2500TLST-21, SB 3000TLST-21
Device type:	1			Typ: Sunny Boy 3000TL-21
	2			Typ: Sunny Boy 4000TL-21
	3			Typ: Sunny Boy 5000TL-21
	4			Typ: Sunny Boy 3600TL-21
	5			Typ: Sunny Boy 2500TLST-21
	6			Typ: Sunny Boy 3000TLST-21
Color of lid:		00		red (additional colors on request)
Cabinet:			0	only enclosure with display, no function
SB 5000SE-10-1Y (price before options):	x	x		Demo device SB 5000SE-10, SB 3600SE-10
Device type:	0			Typ: Sunny Boy 3600SE-10
	1			Typ: Sunny Boy 5000SE-10
Color of lid:		00		red (additional colors on request)

90-234400.01

Stand system for SB5000SE-10-1Y



STP 17000TL-1Y (price before options):	x	xx	x	Demo device STP 15000TL-10
Device type:	2			Typ: Sunny Tripower 15000TL
Color of lid:		08		Gentian blue (additional colors on request)
Cabinet:			0	only enclosure with display, no function

STP 9000TL-2Y (price before options):	x	xx	x	Demo device STP 5000TL-20, STP 6000TL-20, STP 7000TL-20, STP 8000TL-20, STP 9000TL-20, STP 10000TL-20, STP 12000TL-20
Device type:	0			Typ: Sunny Tripower 5000TL
	1			Typ: Sunny Tripower 6000TL
	2			Typ: Sunny Tripower 7000TL
	3			Typ: Sunny Tripower 8000TL
	4			Typ: Sunny Tripower 9000TL
	5			Typ: Sunny Tripower 10000TL
	6			Typ: Sunny Tripower 12000TL
Color of lid:		08		Gentian blue (additional colors on request)
Cabinet:			0	only enclosure with display, no function

STP 25000TL-3Y (price before options):	x		x	Demo device STP 25000TL-30, STP 20000TL-30
Device type:	0			Typ: Sunny Tripower 20000TL-30
	1			Typ: Sunny Tripower 25000TL-30
Color of lid:		08		Gentian blue (additional colors on request)

45-9933 Stand system Sunny TriPower

45-9934 Stand system for SB3000HF-3Y, SB5000TL-2Z, STP9000TL-2Y and SIX.XHM-DUMMY



Communication interfaces

485PB-NR	RS485 interface type Piggy-Back as retrofit kit for SB 1200 SB 1300TL-10/1600TL-10 SB 2100TL
DM-485CB-10	RS485 interface type data module as retrofit kit for SB 3000TL-21/3600TL-21/4000TL-21/5000TL-21/6000TL-21 SB 2500TLST-21/3000TLST-21 STP 15000TL-10 STP 20000TL-30/25000TL-30
485BRD-10	RS485 interface type data module type B as retrofit kit for: STP 5000TL-20/6000TL-20/7000TL-20/8000TL-20/9000TL-20/10000TL-20/12000TL-20
SWDM-10	Speedwire/Webconnect interface type data module as retrofit kit for: SB 3000TL-21/3600TL-21/4000TL-21/5000TL-21/6000TL-21 SB 2500TLST-21/3000TLST-21 STP 15000TL-10 STP 20000TL-30/25000TL-30
SWPB-10	Speedwire/Webconnect interface type piggy-back as retrofit kit for: SB1300TL-10/SB 1600TL-10 SB 2100TL



BTPBINV-NR (price before options):	XX	SMA Bluetooth® interface typ Piggy-Back as retrofit kit for
Device type:		SB 1300TL-10/1600TL-10 SB 2100TL
Documentation:		AU Australia (Documentation: English) BE Belgium (Documentation: German, Dutch, French) CZ Czech Republic (Documentation: Czech) DE Germany (Documentation: German) ES Spain (Documentation: Spanish) FR France (Documentation: French) GB Great Britain (Documentation: English) GR Greece (documentation: Greek) IT Italy (Documentation: Italian) KR Korea (Documentation: Korean) NL Netherlands (Documentation: Dutch) PT Portugal (Documentation: Portuguese) US USA (Documentation: English)
BTPB-EXTANT-NR (price before options):	XX	SMA Bluetooth® interface type Piggy-Back incl. external antenna as retrofit kit for
Device type:		SB 1300TL-10/1600TL-10 SB 2100TL
Documentation:		AU Australia (Documentation: English) BE Belgium (Documentation: German, Dutch, French) CZ Czech Republic (Documentation: Czech) DE Germany (Documentation: German) ES Spain (Documentation: Spanish) FR France (Documentation: French) GB Great Britain (Documentation: English) GR Greece (documentation: Greek) IT Italy (Documentation: Italian) KR Korea (Documentation: Korean) NL Netherlands (Documentation: Dutch) PT Portugal (Documentation: Portuguese) US USA (Documentation: English)



ANTEXTKIT25-10 Antenna extension add-on kit for SMA Bluetooth® Piggy-Back BTPB-EXTANT-NR

MFR01-10 Multi-function relay as retrofit kit for
 SB 3000TL-21/3600TL-21/4000TL-21/5000TL-21
 SB 2500TLST-21/3000TLST-21
 STP 15000TL-10
 SB 3600SE-10/5000SE-10
 STP 20000TL-30/25000TL-30

FANKIT01-10 Additional fan kit for use of inverters in high ambient temperatures for
 SB 3000TL-21/3600TL-21/4000TL-21/5000TL-21/6000TL-21
 SB 2500TLST-21/3000TLST-21

PWCMOD-10 Power control module for retrofit kit for
 SB 3000TL-21/3600TL-21/4000TL-21/5000TL-21
 SB 2500TLST-21/3000TLST-21
 STP 15000TL-10
 SB 3600SE-10/5000SE-10
 STP 20000TL-30/25000TL-30

PWCBRD-10 Power control module type B for retrofit kit for
 STP 5000TL-20/6000TL-20/7000TL-20/8000TL-20/9000TL-20/10000TL-20/12000TL-20

DC Connection

SUNCLIX-FC6-SET SUNCLIX field connector for cross-sections from 2.5 to 6 mm², Set (+/-) for 10 strings

Grounding

PLUGIN-GRD-10-NR SMA Plug-in Grounding as an upgrade kit (Stick) for the positive or negative connection to ground of the DC input for
 SB 2000HF-30/2500HF-30/3000HF-30

PVO-N-20 PV OFFSET BOX
 External device for automatic application of a reverse voltage at the PV generator.
 For regeneration of PV-panels affected by PID.



System Components

GRIDGATE-10 (price before options):	0 xx	Central grid and plant protection 3N~ 230/400 V, with display, terminal for 2 relays
Netzparameter Länder- einstellungen:	DE	Default Setting VDE-AR-N 4105 (standard)

GRIDGATE-20 (price before options):	0 xx	Grid and plant protection 3N~ 230/400 V in compliance with the CEI 0-21 standard (Italy), terminal for 2 relays, 6 digital inputs, IEC 61850-7-2, Speedwire communication
Netzparameter Länder- einstellungen:	IT	Default Setting CEI 0-21 (standard)

Protection and fuse elements

DC_SPD_KIT2-10 Upgrade kit DC overvoltage protector (type II) for input A and B Fits for STP 8000TL-10/1000TL-10/12000TL-10/15000TL-10/17000TL-10

DC_SPD_KIT3-10 Upgrade kit DC overvoltage protector (type II) for input A and B Fits for STP 20000TL-30/25000TL-30



Central inverters CP XT

**Sunny Central 900CP XT (SC-900CP-10-BS)**

Valid from: as provided in contract

**SC-900CP-10-BS
(price before
options):**

Self-commutated 900 kVA PV inverter, suitable for outdoor use, with IGBT semi-conductors in proven B6 topology. Maximum apparent power of 990 kVA at +25°C ambient temperature. Optimum power output through highly efficient MPP tracker. Planned for connection to an external transformer. IP 54-protected inverter enclosure (connection area in IP 43), for protection against aggressive ambient conditions in accordance with IEC 60721-3-4. Innovative air cooling concept OptiCool, standard DC input voltage range to 1000 V, system-integrated DC main distribution with up to nine inputs, motor-driven DC load-break switch, AC contactor and AC circuit breaker, overvoltage protection on DC side. Connection for three-phase electricity supply for operation of the inverter. Equipped as standard with SC-COM as central communication interface which manages the inverter data and ensures the connection to a PV park control. The inverter performs comprehensive grid management functions including:

- AC grid monitoring
- Active power reduction to external requirements
- Active power reduction in event of overfrequency P(f)
- Reactive power reduction to external requirements
- Reactive power provision depending on line voltage or the active power
- AID (Active Islanding Detection)
- FRT (Fault Ride Through) with
 - restricted, dynamic grid support (FRT partial)
 - complete, dynamic grid support (FRT full)

All valid technical data of the inverter can be found in the separate datasheet.

specific price 1)

Comments

1) Can differ depending on options.

Sunny Central 850CP XT (SC-850CP-10-BS)

Valid from: as provided in contract

**SC-850CP-10-BS
(price before
options):**

Self-commutated 850 kVA PV inverter, suitable for outdoor use, with IGBT semi-conductors in proven B6 topology. Maximum apparent power of 935 kVA at +25°C ambient temperature. Optimum power output through highly efficient MPP tracker. Planned for connection to an external transformer. IP 54-protected inverter enclosure (connection area in IP 43), for protection against aggressive ambient conditions in accordance with IEC 60721-3-4. Innovative air cooling concept OptiCool, standard DC input voltage range to 1000 V, system-integrated DC main distribution with up to nine inputs, motor-driven DC load-break switch, AC contactor and AC circuit breaker, overvoltage protection on DC side. Connection for three-phase electricity supply for operation of the inverter. Equipped as standard with SC-COM as central communication interface which manages the inverter data and ensures the connection to a PV park control. The inverter performs comprehensive grid management functions including:

- AC grid monitoring
- Active power reduction to external requirements
- Active power reduction in event of overfrequency P(f)
- Reactive power reduction to external requirements
- Reactive power provision depending on line voltage or the active power
- AID (Active Islanding Detection)
- FRT (Fault Ride Through) with
 - restricted, dynamic grid support (FRT partial)
 - complete, dynamic grid support (FRT full)

All valid technical data of the inverter can be found in the separate datasheet.

specific price 1)

Comments

1) Can differ depending on options.



Sunny Central 800CP XT (SC-800CP-10-BS)

Valid from: as provided in contract

SC-800CP-10-BS
(Basispreis):

Self-commutated 800 kVA PV inverter, suitable for outdoor use, with IGBT semi-conductors in proven B6 topology. Maximum apparent power of 880 kVA at +25°C ambient temperature. Optimum power output through highly efficient MPP tracker. Planned for connection to an external transformer. IP 54-protected inverter enclosure (connection area in IP 43), for protection against aggressive ambient conditions in accordance with IEC 60721-3-4. Innovative air cooling concept OptiCool, standard DC input voltage range to 1000 V, system-integrated DC main distribution with up to nine inputs, motor-driven DC load-break switch, AC contactor and AC circuit breaker, overvoltage protection on DC side. Connection for three-phase electricity supply for operation of the inverter. Equipped as standard with SC-COM as central communication interface which manages the inverter data and ensures the connection to a PV park control. The inverter performs comprehensive grid management functions including:

- AC grid monitoring
- Active power reduction to external requirements
- Active power reduction in event of overfrequency P(f)
- Reactive power reduction to external requirements
- Reactive power provision depending on line voltage or the active power
- AID (Active Islanding Detection)
- FRT (Fault Ride Through) with
 - restricted, dynamic grid support (FRT partial)
 - complete, dynamic grid support (FRT full)

All valid technical data of the inverter can be found in the separate datasheet.

specific price 1)

Comments

1) Can differ depending on options.

Sunny Central 760CP XT (SC-760CP-10-BS)

Valid from: as provided in contract

SC-760CP-10-BS
(Basispreis):

Self-commutated 760 kVA PV inverter, suitable for outdoor use, with IGBT semi-conductors in proven B6 topology. Maximum apparent power of 836 kVA at +25°C ambient temperature. Optimum power output through highly efficient MPP tracker. Planned for connection to an external transformer. IP 54-protected inverter enclosure (connection area in IP 43), for protection against aggressive ambient conditions in accordance with IEC 60721-3-4. Innovative air cooling concept OptiCool, standard DC input voltage range to 1000 V, system-integrated DC main distribution with up to nine inputs, motor-driven DC load-break switch, AC contactor and AC circuit breaker, overvoltage protection on DC side. Connection for three-phase electricity supply for operation of the inverter. Equipped as standard with SC-COM as central communication interface which manages the inverter data and ensures the connection to a PV park control. The inverter performs comprehensive grid management functions including:

- AC grid monitoring
- Active power reduction to external requirements
- Active power reduction in event of overfrequency P(f)
- Reactive power reduction to external requirements
- Reactive power provision depending on line voltage or the active power
- AID (Active Islanding Detection)
- FRT (Fault Ride Through) with
 - restricted, dynamic grid support (FRT partial)
 - complete, dynamic grid support (FRT full)

All valid technical data of the inverter can be found in the separate datasheet.

specific price 1)

Comments

1) Can differ depending on options.

**Sunny Central 720CP XT (SC-720CP-10-BS)**

Valid from: as provided in contract

**SC-720CP-10-BS
(Basispreis):**

Self-commutated 720 kVA PV inverter, suitable for outdoor use, with IGBT semi-conductors in proven B6 topology. Maximum apparent power of 792 kVA at +25°C ambient temperature. Optimum power output through highly efficient MPP tracker. Planned for connection to an external transformer. IP 54-protected inverter enclosure (connection area in IP 43), for protection against aggressive ambient conditions in accordance with IEC 60721-3-4. Innovative air cooling concept OptiCool, standard DC input voltage range to 1000 V, system-integrated DC main distribution with up to nine inputs, motor-driven DC load-break switch, AC contactor and AC circuit breaker, overvoltage protection on DC side. Connection for three-phase electricity supply for operation of the inverter. Equipped as standard with SC-COM as central communication interface which manages the inverter data and ensures the connection to a PV park control. The inverter performs comprehensive grid management functions including:

- AC grid monitoring
- Active power reduction to external requirements
- Active power reduction in event of overfrequency P(f)
- Reactive power reduction to external requirements
- Reactive power provision depending on line voltage or the active power
- AID (Active Islanding Detection)
- FRT (Fault Ride Through) with
 - restricted, dynamic grid support (FRT partial)
 - complete, dynamic grid support (FRT full)

All valid technical data of the inverter can be found in the separate datasheet.

specific price 1)

Comments

1) Can differ depending on options.

Sunny Central 630CP XT (SC-630CP-10-BS)

Valid from: as provided in contract

**SC-630CP-10-BS
(Basispreis):**

Self-commutated 630 kVA PV inverter, suitable for outdoor use, with IGBT semi-conductors in proven B6 topology. Maximum apparent power of 700 kVA at +25°C ambient temperature. Optimum power output through highly efficient MPP tracker. Planned for connection to an external transformer. IP 54-protected inverter enclosure (connection area in IP 43), for protection against aggressive ambient conditions in accordance with IEC 60721-3-4. Innovative air cooling concept OptiCool, standard DC input voltage range to 1000 V, system-integrated DC main distribution with up to nine inputs, motor-driven DC load-break switch, AC contactor and AC circuit breaker, overvoltage protection on DC side. Connection for three-phase electricity supply for operation of the inverter. Equipped as standard with SC-COM as central communication interface which manages the inverter data and ensures the connection to a PV park control. The inverter performs comprehensive grid management functions including:

- AC grid monitoring
- Active power reduction to external requirements
- Active power reduction in event of overfrequency P(f)
- Reactive power reduction to external requirements
- Reactive power provision depending on line voltage or the active power
- AID (Active Islanding Detection)
- FRT (Fault Ride Through) with
 - restricted, dynamic grid support (FRT partial)
 - complete, dynamic grid support (FRT full)

All valid technical data of the inverter can be found in the separate datasheet.

specific price 1)

Comments

1) Can differ depending on options.



Sunny Central 500CP XT (SC-500CP-10-BS)

Valid from: as provided in contract

SC-500CP-10-BS
(Basispreis):

Self-commutated 500 kVA PV inverter, suitable for outdoor use, with IGBT semi-conductors in proven B6 topology. Maximum apparent power of 550 kVA at +25°C ambient temperature. Optimum power output through highly efficient MPP tracker. Planned for connection to an external transformer.

IP 54-protected inverter enclosure (connection area in IP 43), for protection against aggressive ambient conditions in accordance with IEC 60721-3-4. Innovative air cooling concept OptiCool, standard DC input voltage range to 1000 V, system-integrated DC main distribution with up to nine inputs, motor-driven DC load-break switch, AC contactor and AC circuit breaker, overvoltage protection on DC side.

Connection for three-phase electricity supply for operation of the inverter.

Equipped as standard with SC-COM as central communication interface which manages the inverter data and ensures the connection to a PV park control.

The inverter performs comprehensive grid management functions including:

- AC grid monitoring
- Active power reduction to external requirements
- Active power reduction in event of overfrequency P(f)
- Reactive power reduction to external requirements
- Reactive power provision depending on line voltage or the active power
- AID (Active Islanding Detection)
- FRT (Fault Ride Through) with
 - restricted, dynamic grid support (FRT partial)
 - complete, dynamic grid support (FRT full)

All valid technical data of the inverter can be found in the separate datasheet.

specific price 1)

Comments

1) Can differ depending on options.

Options for SCxxxCP-10-BS

Valid from: as provided in contract

	0	0	0	1	0	x	xx	xx	2	2	6	0	0	0	0
specific price 1)															
Communication interface						2									SC-COM + LWL
						3									SC-COM + RJ45
Language:						DE									German
						EN									English
						ES									Spanish
						KR									Korean
						IT									Italian
						FR									French
						CN									Chinese
						GR									Greek
						RO									Romanian
						TR									Turkish
Country of destination:						DE									Germany
						EN									England
						ES									Spain
						KR									Korea
						IT									Italy
						FR									France
						CN									China
						GR									Greece
						RO									Romania
						IL									Israel
						TR									Turkey
						US									USA
						ZA									South Africa
						PL									Poland
						TH									Thailand
						IN									India
						5H									Standard 50 Hz
						6H									Standard 60 Hz

Comments

1) Can differ depending on options.

**Sunny Central 1000CP XT (SC-1000CP-10)**

Valid from: as provided in contract

**SC-1000CP-10
(price before
options):**

Self-commutated 1000 kVA PV inverter, suitable for outdoor use, with IGBT semi-conductors in proven B6 topology. Maximum apparent power of 1100 kVA at +25°C ambient temperature. Optimum power output through highly efficient MPP tracker. Planned for connection to an external transformer. IP 54-protected inverter enclosure (connection area in IP 43), for protection against aggressive ambient conditions in accordance with IEC 60721-3-4. Innovative air cooling concept OptiCool, standard DC input voltage range to 1000 V, system-integrated DC main distribution with up to eight inputs, motor-driven DC load-break switch, AC contactor and AC circuit breaker, overvoltage protection on DC side.

Connection for three-phase electricity supply for operation of the inverter.

Equipped as standard with SC-COM as central communication interface which manages the inverter data and ensures the connection to a PV park control.

The inverter performs comprehensive grid management functions including:

- AC grid monitoring
- Active power reduction to external requirements
- Active power reduction in event of overfrequency P(f)
- Reactive power reduction to external requirements
- Reactive power provision depending on line voltage or the active power
- AID (Active Islanding Detection)
- FRT (Fault Ride Through) with
 - restricted, dynamic grid support (FRT partial)
 - complete, dynamic grid support (FRT full)

All valid technical data of the inverter can be found in the separate datasheet.

specific price 1)



Options for SC-1000CP-10

Valid from: as provided in contract

	x	x	x	x	0	x	xx	xx	x	x	-	x	x	x	x
specific price 1)															
DC connection:	0														Fuses on all poles
	1														Fuses in plus, isolating blades in minus
	2														Fuses in minus, isolating blades in plus
DC fuses:	0														Without
	3														315 A (7 per pole)
	4														400 A (6 per pole)
	7														315 A (8 pcs. per pole)
	8														400 A (8 pcs. per pole)
	9														400 A (7 pcs. per pole)
Grounding:	0														Without
	1														GFDI minus grounding
	2														Remote GFDI minus grounding
	3														GFDI plus grounding
Insulation monitoring:	4														Remote GFDI plus grounding
	0														none
	1														Yes
Communication interface	2														Yes, with grounding
	2														SC-COM + LWL
	3														SC-COM + RJ45
	6														SC-COM + Optical fibre + RJ45+ Managed Switch
Language:/Country of destination:							DE	DE							German/Germany
							EN	EN							English/England
							ES	ES							Spanish/Spain
							KR	KR							Korean/Korea
							IT	IT							Italian/Italy
							FR	FR							French/France
							GR	GR							Greek/Greece
							RO	RO							Romanian/Romania
							TR	TR							Turkish/Turkey
							-	IL							Israel
							-	US							USA
								PL							Poland
								TH							Thailand
								IN							India
								5H							Standard 50 Hz
								6H							Standard 60 Hz
AC switch:									2						Circuit breaker
String current monitoring:									0						none
									1						yes, 2 hubs
									2						yes, 3 hubs
									9						Zone Monitoring
Cabinet layout:										0					Standard
										2					For station installation
Additional functions:											0				none
Temperature range:												0			-25°C
												1			-40°C
Q at Night													0		no
													1		yes

Comments

1) Can differ depending on options.



Sunny Central 900CP XT (SC-900CP-10)

Valid from: as provided in contract

SC-900CP-10
 (price before
 options):

Self-commutated 900 kVA PV inverter, suitable for outdoor use, with IGBT semi-conductors in proven B6 topology. Maximum apparent power of 990 kVA at +25°C ambient temperature. Optimum power output through highly efficient MPP tracker. Planned for connection to an external transformer. IP 54-protected inverter enclosure (connection area in IP 43), for protection against aggressive ambient conditions in accordance with IEC 60721-3-4. Innovative air cooling concept OptiCool, standard DC input voltage range to 1000 V, system-integrated DC main distribution with up to nine inputs, motor-driven DC load-break switch, AC contactor and AC circuit breaker, overvoltage protection on DC side. Connection for three-phase electricity supply for operation of the inverter. Equipped as standard with SC-COM as central communication interface which manages the inverter data and ensures the connection to a PV park control. The inverter performs comprehensive grid management functions including:

- AC grid monitoring
- Active power reduction to external requirements
- Active power reduction in event of overfrequency P(f)
- Reactive power reduction to external requirements
- Reactive power provision depending on line voltage or the active power
- AID (Active Islanding Detection)
- FRT (Fault Ride Through) with
 - restricted, dynamic grid support (FRT partial)
 - complete, dynamic grid support (FRT full)

All valid technical data of the inverter can be found in the separate datasheet. Reduced inverter output power at altitudes above 2000 meters.

specific price 1)

Sunny Central 850CP XT (SC-850CP-10)

Valid from: as provided in contract

SC-850CP-10
 (price before
 options):

Self-commutated 850 kVA PV inverter, suitable for outdoor use, with IGBT semi-conductors in proven B6 topology. Maximum apparent power of 935 kVA at +25°C ambient temperature. Optimum power output through highly efficient MPP tracker. Planned for connection to an external transformer. IP 54-protected inverter enclosure (connection area in IP 43), for protection against aggressive ambient conditions in accordance with IEC 60721-3-4. Innovative air cooling concept OptiCool, standard DC input voltage range to 1000 V, system-integrated DC main distribution with up to nine inputs, motor-driven DC load-break switch, AC contactor and AC circuit breaker, overvoltage protection on DC side. Connection for three-phase electricity supply for operation of the inverter. Equipped as standard with SC-COM as central communication interface which manages the inverter data and ensures the connection to a PV park control. The inverter performs comprehensive grid management functions including:

- AC grid monitoring
- Active power reduction to external requirements
- Active power reduction in event of overfrequency P(f)
- Reactive power reduction to external requirements
- Reactive power provision depending on line voltage or the active power
- AID (Active Islanding Detection)
- FRT (Fault Ride Through) with
 - restricted, dynamic grid support (FRT partial)
 - complete, dynamic grid support (FRT full)

All valid technical data of the inverter can be found in the separate datasheet. Reduced inverter output power at altitudes above 2000 meters.

specific price 1)

**Sunny Central 800CP XT (SC-800CP-10)**

Valid from: as provided in contract

**SC-800CP-10
(price before
options):**

Self-commutated 800 kVA PV inverter, suitable for outdoor use, with IGBT semi-conductors in proven B6 topology. Maximum apparent power of 880 kVA at +25°C ambient temperature. Optimum power output through highly efficient MPP tracker. Planned for connection to an external transformer. IP 54-protected inverter enclosure (connection area in IP 43), for protection against aggressive ambient conditions in accordance with IEC 60721-3-4. Innovative air cooling concept OptiCool, standard DC input voltage range to 1000 V, system-integrated DC main distribution with up to nine inputs, motor-driven DC load-break switch, AC contactor and AC circuit breaker, overvoltage protection on DC side. Connection for three-phase electricity supply for operation of the inverter. Equipped as standard with SC-COM as central communication interface which manages the inverter data and ensures the connection to a PV park control. The inverter performs comprehensive grid management functions including:

- AC grid monitoring
- Active power reduction to external requirements
- Active power reduction in event of overfrequency P(f)
- Reactive power reduction to external requirements
- Reactive power provision depending on line voltage or the active power
- AID (Active Islanding Detection)
- FRT (Fault Ride Through) with
 - restricted, dynamic grid support (FRT partial)
 - complete, dynamic grid support (FRT full)

All valid technical data of the inverter can be found in the separate datasheet. Reduced inverter output power at altitudes above 2000 meters.

specific price 1)

Sunny Central 760CP XT (SC-760CP-10)

Valid from: as provided in contract

**SC-760CP-10
(price before
options):**

Self-commutated 760 kVA PV inverter, suitable for outdoor use, with IGBT semi-conductors in proven B6 topology. Maximum apparent power of 836 kVA at +25°C ambient temperature. Optimum power output through highly efficient MPP tracker. Planned for connection to an external transformer. IP 54-protected inverter enclosure (connection area in IP 43), for protection against aggressive ambient conditions in accordance with IEC 60721-3-4. Innovative air cooling concept OptiCool, standard DC input voltage range to 1000 V, system-integrated DC main distribution with up to nine inputs, motor-driven DC load-break switch, AC contactor and AC circuit breaker, overvoltage protection on DC side. Connection for three-phase electricity supply for operation of the inverter. Equipped as standard with SC-COM as central communication interface which manages the inverter data and ensures the connection to a PV park control. The inverter performs comprehensive grid management functions including:

- AC grid monitoring
- Active power reduction to external requirements
- Active power reduction in event of overfrequency P(f)
- Reactive power reduction to external requirements
- Reactive power provision depending on line voltage or the active power
- AID (Active Islanding Detection)
- FRT (Fault Ride Through) with
 - restricted, dynamic grid support (FRT partial)
 - complete, dynamic grid support (FRT full)

All valid technical data of the inverter can be found in the separate datasheet. Reduced inverter output power at altitudes above 2000 meters.

specific price 1)

**Sunny Central 720CP XT (SC-720CP-10)**

Valid from: as provided in contract

**SC-720CP-10
(price before
options):**

Self-commutated 720 kVA PV inverter, suitable for outdoor use, with IGBT semi-conductors in proven B6 topology. Maximum apparent power of 792 kVA at +25°C ambient temperature. Optimum power output through highly efficient MPP tracker. Planned for connection to an external transformer. IP 54-protected inverter enclosure (connection area in IP 43), for protection against aggressive ambient conditions in accordance with IEC 60721-3-4. Innovative air cooling concept OptiCool, standard DC input voltage range to 1000 V, system-integrated DC main distribution with up to nine inputs, motor-driven DC load-break switch, AC contactor and AC circuit breaker, overvoltage protection on DC side. Connection for three-phase electricity supply for operation of the inverter. Equipped as standard with SC-COM as central communication interface which manages the inverter data and ensures the connection to a PV park control. The inverter performs comprehensive grid management functions including:

- AC grid monitoring
- Active power reduction to external requirements
- Active power reduction in event of overfrequency P(f)
- Reactive power reduction to external requirements
- Reactive power provision depending on line voltage or the active power
- AID (Active Islanding Detection)
- FRT (Fault Ride Through) with
 - restricted, dynamic grid support (FRT partial)
 - complete, dynamic grid support (FRT full)

All valid technical data of the inverter can be found in the separate datasheet. Reduced inverter output power at altitudes above 2000 meters.

specific price 1)

Sunny Central 630CP XT (SC-630CP-10)

Valid from: as provided in contract

**SC-630CP-10
(price before
options):**

Self-commutated 630 kVA PV inverter, suitable for outdoor use, with IGBT semi-conductors in proven B6 topology. Maximum apparent power of 700 kVA at +25°C ambient temperature. Optimum power output through highly efficient MPP tracker. Planned for connection to an external transformer. IP 54-protected inverter enclosure (connection area in IP 43), for protection against aggressive ambient conditions in accordance with IEC 60721-3-4. Innovative air cooling concept OptiCool, standard DC input voltage range to 1000 V, system-integrated DC main distribution with up to nine inputs, motor-driven DC load-break switch, AC contactor and AC circuit breaker, overvoltage protection on DC side. Connection for three-phase electricity supply for operation of the inverter. Equipped as standard with SC-COM as central communication interface which manages the inverter data and ensures the connection to a PV park control. The inverter performs comprehensive grid management functions including:

- AC grid monitoring
- Active power reduction to external requirements
- Active power reduction in event of overfrequency P(f)
- Reactive power reduction to external requirements
- Reactive power provision depending on line voltage or the active power
- AID (Active Islanding Detection)
- FRT (Fault Ride Through) with
 - restricted, dynamic grid support (FRT partial)
 - complete, dynamic grid support (FRT full)

All valid technical data of the inverter can be found in the separate datasheet. Reduced inverter output power at altitudes above 2000 meters.

specific price 1)

**Sunny Central 500CP XT (SC-500CP-10)**

Valid from: as provided in contract

**SC-500CP-10
(price before
options):**

Self-commutated 500 kVA PV inverter, suitable for outdoor use, with IGBT semi-conductors in proven B6 topology. Maximum apparent power of 550 kVA at +25°C ambient temperature. Optimum power output through highly efficient MPP tracker. Planned for connection to an external transformer. IP 54-protected inverter enclosure (connection area in IP 43), for protection against aggressive ambient conditions in accordance with IEC 60721-3-4. Innovative air cooling concept OptiCool, standard DC input voltage range to 1000 V, system-integrated DC main distribution with up to nine inputs, motor-driven DC load-break switch, AC contactor and AC circuit breaker, overvoltage protection on DC side.

Connection for three-phase electricity supply for operation of the inverter.

Equipped as standard with SC-COM as central communication interface which manages the inverter data and ensures the connection to a PV park control.

The inverter performs comprehensive grid management functions including:

- AC grid monitoring
- Active power reduction to external requirements
- Active power reduction in event of overfrequency P(f)
- Reactive power reduction to external requirements
- Reactive power provision depending on line voltage or the active power
- AID (Active Islanding Detection)
- FRT (Fault Ride Through) with
 - restricted, dynamic grid support (FRT partial)
 - complete, dynamic grid support (FRT full)

All valid technical data of the inverter can be found in the separate datasheet. Reduced inverter output power at altitudes above 2000 meters.

specific price 1)



Options for SCxxxCP-10

Valid from: as provided in contract

	x	x	x	x	0	x	xx	xx	x	-	x	x	x	x
specific price 1)														
DC connection:	0													Fuses on all poles
	1													Fuses in plus, isolating blades in minus
	2													Fuses in minus, isolating blades in plus
	4													Bus bar
DC fuses:	0													Without
	1													200 A (9 per pole)
	2													250 A (9 per pole)
	3													315 A (7 per pole)
	4													400 A (6 per pole)
	5													125 A (9 pcs. per pole)
	6													160 A (9 pcs. per pole)
	7													315 A (8 pcs. per pole)
	8													400 A (8 pcs. per pole)
	9													400 A (7 pcs. per pole)
Grounding:	0													Without
	1													GFDI minus grounding
	2													Remote GFDI minus grounding
	3													GFDI plus grounding
Insulation monitoring:	4													Remote GFDI plus grounding
	0													none
	1													Yes
Communication interface	2													Yes, with grounding
	2													SC-COM + LWL
	3													SC-COM + RJ45
Language:/Country of destination:	6													SC-COM + Optical fibre + RJ45+ Managed Switch
							DE	DE						German/Germany
							EN	EN						English/England
							ES	ES						Spanish/Spain
							KR	KR						Korean/Korea
							IT	IT						Italian/Italy
							FR	FR						French/France
							CN	CN						Chinese/China
							GR	GR						Greek/Greece
							RO	RO						Romanian/Romania
							TR	TR						Turkish/Turkey
							-	IL						Israel
							-	US						USA
							-	ZA						South Africa
								PL						Poland
								TH						Thailand
								IN						India
								5H						Standard 50 Hz
								6H						Standard 60 Hz
AC switch:								2						Circuit breaker
								3						Without
String current monitoring:									0					none
									1					yes, 2 hubs
									2					yes, 3 hubs
									9					Zone Monitoring
Cabinet layout:										0				Standard
										2				For station installation
Additional functions:											0			none
											2			IEEE 1547
Temperature range:												0		-25°C
												1		-40°C
Q at Night													0	no
													1	yes

Comments

1) Can differ depending on options.



Stations and Transformers



Transformer Compact Station for SC-CP-Inverter (TCS 1800SC-DE)

Valid from: as provided in contract

TCS 1800SC-DE (price before options):	6	DE	x	x	x	x	x	x	x	x	x	0	0	xx	The compact station comes with an oil-hermetic transformer for 20 kV is permitted for ambient temperatures from -20°C to +40°C.
Cabinet:			0	1											Concrete compact station Steel compact station
Voltage level:				0											20 kV
Medium voltage transformer:					1										Transformer with iron core
LV power switch:					0	1									Without With
Internal power supply:					0	1									Without With
Communit:						0	1								Without With
Medium voltage switchgear:							0	2							Without Ring connection (3-field)
Surrounding area:								0	1						Standard Protection against chemically active substances
Language:													DE	EN	German English

Comments

Incl. transport, transport insurance and off-loading in the excavation prepared customer-side. The customer guarantees unlimited access to the off-loading site.

Prices valid for delivery within Germany (not including islands).

CIP INCOTERMS® 2010

Depending on country-specific requirements the price and technical parameters can vary.

DE) Version for Germany

The transport costs for release orders and/or orders of individual components will be charged separately.



Transformer Compact Station for SC-CP-Inverter (TCS 1600SC-DE)

Valid from: as provided in contract

TCS 1600SC-DE (price before options):	5	DE	x	x	x	x	x	x	x	x	x	0	0	xx	The compact station comes with an oil-hermetic transformer for 20 kV is permitted for ambient temperatures from -20°C to +40°C.
Cabinet:			0	1											Concrete compact station Steel compact station
Voltage level:				0											20 kV
Medium voltage transformer:					1										Transformer with iron core
LV power switch:					0	1									Without With
Internal power supply:					0	1									Without With
Communit:							0	1							Without With
Medium voltage switchgear:							0	2							Without Ring connection (3-field)
Surrounding area:									0	1					Standard Protection against chemically active substances
Language:														DE EN	German English

Comments

Incl. transport, transport insurance and off-loading in the excavation prepared customer-side. The customer guarantees unlimited access to the off-loading site.

Prices valid for delivery within Germany (not including islands).

CIP INCOTERMS® 2010

Depending on country-specific requirements the price and technical parameters can vary.

DE) Version for Germany

The transport costs for release orders and/or orders of individual components will be charged separately.



Transformer Compact Station for SC-CP-Inverter (TCS 1250SC-DE)

Valid from: as provided in contract

TCS 1250SC-DE (price before options):	4	DE	x	x	x	x	x	x	x	x	x	0	0	xx	The compact station comes with an oil-hermetic transformer for 20 kV is permitted for ambient temperatures from -20°C to +40°C.
Cabinet:			0	1											Concrete compact station Steel compact station
Voltage level:				0											20 kV
Medium voltage transformer:					1										Transformer with iron core
LV power switch:					0	1									Without With
Internal power supply:					0	1									Without With
Communit:							0	1							Without With
Medium voltage switchgear:							0	2							Without Ring connection (3-field)
Surrounding area:									0	1					Standard Protection against chemically active substances
Language:													DE	EN	German English

Comments

Incl. transport, transport insurance and off-loading in the excavation prepared customer-side. The customer guarantees unlimited access to the off-loading site.

Prices valid for delivery within Germany (not including islands).

CIP INCOTERMS® 2010

Depending on country-specific requirements the price and technical parameters can vary.

DE) Version for Germany

The transport costs for release orders and/or orders of individual components will be charged separately.



Transformer Compact Station for SC-CP-Inverter (TCS 1000SC-DE)

Valid from: as provided in contract

TCS 1000SC-DE (price before options):	3	DE	x	x	x	x	x	x	x	x	x	0	0	xx	The compact station comes with an oil-hermetic transformer for 20 kV is permitted for ambient temperatures from -20°C to +40°C.
Cabinet:			0	1											Concrete compact station Steel compact station
Voltage level:				0											20 kV
Medium voltage transformer:					1										Transformer with iron core
LV power switch:					0	1									Without With
Internal power supply:					0	1									Without With
Communit:							0	1							Without With
Medium voltage switchgear:							0	2							Without Ring connection (3-field)
Surrounding area:									0	1					Standard Protection against chemically active substances
Language:														DE EN	German English

Comments

Incl. transport, transport insurance and off-loading in the excavation prepared customer-side. The customer guarantees unlimited access to the off-loading site.

Prices valid for delivery within Germany (not including islands).

CIP INCOTERMS® 2010

Depending on country-specific requirements the price and technical parameters can vary.

DE) Version for Germany

The transport costs for release orders and/or orders of individual components will be charged separately.



Transformer Compact Station for SC-CP-Inverter (TCS 900SC-DE)

Valid from: as provided in contract

TCS 900SC-DE (price before options):	7	DE	x	x	x	x	x	x	x	x	x	0	0	xx	The compact station comes with an oil-hermetic transformer for 20 kV is permitted for ambient temperatures from -20°C to +40°C.
Cabinet:			0	1											Concrete compact station Steel compact station
Voltage level:				0											20 kV
Medium voltage transformer:					1										Transformer with iron core
LV power switch:					0	1									Without With
Internal power supply:					0	1									Without With
Communit:							0	1							Without With
Medium voltage switchgear:								0	2						Without Ring connection (3-field)
Surrounding area:									0	1					Standard Protection against chemically active substances
Language:													DE	EN	German English

Comments

Incl. transport, transport insurance and off-loading in the excavation prepared customer-side. The customer guarantees unlimited access to the off-loading site.

Prices valid for delivery within Germany (not including islands).

CIP INCOTERMS® 2010

Depending on country-specific requirements the price and technical parameters can vary.

DE) Version for Germany

The transport costs for release orders and/or orders of individual components will be charged separately.



Transformer Compact Station for SC-CP-Inverter (TCS 800SC-DE)

Valid from: as provided in contract

TCS 800SC-DE (price before options):	2	DE	x	x	x	x	x	x	x	x	x	0	0	xx	The compact station comes with an oil-hermetic transformer for 20 kV is permitted for ambient temperatures from -20°C to +40°C.
Cabinet:			0	1											Concrete compact station Steel compact station
Voltage level:				0											20 kV
Medium voltage transformer:					1										Transformer with iron core
LV power switch:					0	1									Without With
Internal power supply:					0	1									Without With
Communit:							0	1							Without With
Medium voltage switchgear:							0	2							Without Ring connection (3-field)
Surrounding area:									0	1					Standard Protection against chemically active substances
Language:													DE	EN	German English

Comments

Incl. transport, transport insurance and off-loading in the excavation prepared customer-side. The customer guarantees unlimited access to the off-loading site.

Prices valid for delivery within Germany (not including islands).

CIP INCOTERMS® 2010

Depending on country-specific requirements the price and technical parameters can vary.

DE) Version for Germany

The transport costs for release orders and/or orders of individual components will be charged separately.



Transformer Compact Station for SC-CP-Inverter (TCS 630SC-DE)

Valid from: as provided in contract

TCS 630SC-DE (price before options):	1	DE	x	x	x	x	x	x	x	x	x	0	0	xx	The compact station comes with an oil-hermetic transformer for 20 kV is permitted for ambient temperatures from -20°C to +40°C.
Cabinet:			0	1											Concrete compact station Steel compact station
Voltage level:				0											20 kV
Medium voltage transformer:					1										Transformer with iron core
LV power switch:					0	1									Without With
Internal power supply:					0	1									Without With
Communit:							0	1							Without With
Medium voltage switchgear:								0	2						Without Ring connection (3-field)
Surrounding area:									0	1					Standard Protection against chemically active substances
Language:													DE	EN	German English

Comments

Incl. transport, transport insurance and off-loading in the excavation prepared customer-side. The customer guarantees unlimited access to the off-loading site.

Prices valid for delivery within Germany (not including islands).

CIP INCOTERMS® 2010

Depending on country-specific requirements the price and technical parameters can vary.

DE) Version for Germany

The transport costs for release orders and/or orders of individual components will be charged separately.



Transformer Compact Station for SC-CP-Inverter (TCS 500SC-DE)

Valid from: as provided in contract

TCS 500SC-DE (price before options):	0	DE	x	x	x	x	x	x	x	x	x	0	0	xx	The compact station comes with an oil-hermetic transformer for 20 kV is permitted for ambient temperatures from -20°C to +40°C.
Cabinet:			0	1											Concrete compact station Steel compact station
Voltage level:				0											20 kV
Medium voltage transformer:					1										Transformer with iron core
LV power switch:					0	1									Without With
Internal power supply:					0	1									Without With
Communit:							0	1							Without With
Medium voltage switchgear:							0	2							Without Ring connection (3-field)
Surrounding area:									0	1					Standard Protection against chemically active substances
Language:													DE	EN	German English

Comments

Incl. transport, transport insurance and off-loading in the excavation prepared customer-side. The customer guarantees unlimited access to the off-loading site.

Prices valid for delivery within Germany (not including islands).

CIP INCOTERMS® 2010

Depending on country-specific requirements the price and technical parameters can vary.

DE) Version for Germany

The transport costs for release orders and/or orders of individual components will be charged separately.



Transformer Compact Station for SC-CP-Inverter (TCS 1800SC-BG)

Valid from: as provided in contract

TCS 1800SC-BG (price before options):	6	BG	x	x	x	x	x	x	x	x	x	0	0	xx	The compact station comes with an oil-hermetic transformer for 20 kV is permitted for ambient temperatures from -20°C to +40°C.
Cabinet:			0												Concrete compact station
Voltage level:				0											20 kV
Medium voltage transformer:					1										Transformer with iron core
LV power switch:						0									Without
						1									With
Internal power supply:							0								Without
							1								With
Communit:								0							Without
								1							With
Medium voltage switchgear:									0						Without
									2						Ring connection (3-field)
Surrounding area:										0					Standard
										1					Protection against chemically active substances
Language:														EN	English
														BG	Bulgarian

Comments

Incl. transport, transport insurance and off-loading in the excavation prepared customer-side. The customer guarantees unlimited access to the off-loading site.

Prices valid for delivery within Bulgaria (not including islands).

CIP INCOTERMS® 2010

Depending on country-specific requirements the price and technical parameters can vary.

BG) Version for Bulgaria

The transport costs for release orders and/or orders of individual components will be charged separately.



Transformer Compact Station for SC-CP-Inverter (TCS 1600SC-BG)

Valid from: as provided in contract

TCS 1600SC-BG (price before options):	5	BG	x	x	x	x	x	x	x	x	0	0	xx	The compact station comes with an oil-hermetic transformer for 20 kV is permitted for ambient temperatures from -20°C to +40°C.
Cabinet:			0											Concrete compact station
Voltage level:				0										20 kV
Medium voltage transformer:					1									Transformer with iron core
LV power switch:						0								Without
						1								With
Internal power supply:							0							Without
							1							With
Communit:								0						Without
								1						With
Medium voltage switchgear:									0					Without
									2					Ring connection (3-field)
Surrounding area:										0				Standard
										1				Protection against chemically active substances
Language:													EN	English
													BG	Bulgarian

Comments

Incl. transport, transport insurance and off-loading in the excavation prepared customer-side. The customer guarantees unlimited access to the off-loading site.

Prices valid for delivery within Bulgaria (not including islands).

CIP INCOTERMS® 2010

Depending on country-specific requirements the price and technical parameters can vary.

BG) Version for Bulgaria

The transport costs for release orders and/or orders of individual components will be charged separately.



Transformer Compact Station for SC-CP-Inverter (TCS 1250SC-BG)

Valid from: as provided in contract

TCS 1250SC-BG (price before options):	4	BG	x	x	x	x	x	x	x	x	0	0	xx	The compact station comes with an oil-hermetic transformer for 20 kV is permitted for ambient temperatures from -20°C to +40°C.
Cabinet:			0											Concrete compact station
Voltage level:			0											20 kV
Medium voltage transformer:				1										Transformer with iron core
LV power switch:					0									Without
					1									With
Internal power supply:						0								Without
						1								With
Communit:							0							Without
							1							With
Medium voltage switchgear:								0						Without
								2						Ring connection (3-field)
Surrounding area:									0					Standard
									1					Protection against chemically active substances
Language:													EN	English
													BG	Bulgarian

Comments

Incl. transport, transport insurance and off-loading in the excavation prepared customer-side. The customer guarantees unlimited access to the off-loading site.

Prices valid for delivery within Bulgaria (not including islands).

CIP INCOTERMS® 2010

Depending on country-specific requirements the price and technical parameters can vary.

BG) Version for Bulgaria

The transport costs for release orders and/or orders of individual components will be charged separately.



Transformer Compact Station for SC-CP-Inverter (TCS 1000SC-BG)

Valid from: as provided in contract

TCS 1000SC-BG (price before options):	3	BG	x	x	x	x	x	x	x	x	0	0	xx	The compact station comes with an oil-hermetic transformer for 20 kV is permitted for ambient temperatures from -20°C to +40°C.
Cabinet:			0											Concrete compact station
Voltage level:				0										20 kV
Medium voltage transformer:					1									Transformer with iron core
LV power switch:						0								Without
						1								With
Internal power supply:							0							Without
							1							With
Communit:								0						Without
								1						With
Medium voltage switchgear:									0					Without
									2					Ring connection (3-field)
Surrounding area:										0				Standard
										1				Protection against chemically active substances
Language:													EN	English
													BG	Bulgarian

Comments

Incl. transport, transport insurance and off-loading in the excavation prepared customer-side. The customer guarantees unlimited access to the off-loading site.

Prices valid for delivery within Bulgaria (not including islands).

CIP INCOTERMS® 2010

Depending on country-specific requirements the price and technical parameters can vary.

BG) Version for Bulgaria

The transport costs for release orders and/or orders of individual components will be charged separately.



Transformer Compact Station for SC-CP-Inverter (TCS 900SC-BG)

Valid from: as provided in contract

TCS 900SC-BG (price before options):	7	BG	x	x	x	x	x	x	x	x	x	0	0	xx	The compact station comes with an oil-hermetic transformer for 20 kV is permitted for ambient temperatures from -20°C to +40°C.
Cabinet:			0												Concrete compact station
Voltage level:				0											20 kV
Medium voltage transformer:					1										Transformer with iron core
LV power switch:						0									Without
						1									With
Internal power supply:							0								Without
							1								With
Communit:								0							Without
								1							With
Medium voltage switchgear:									0						Without
									2						Ring connection (3-field)
Surrounding area:										0					Standard
										1					Protection against chemically active substances
Language:														EN	English
														BG	Bulgarian

Comments

Incl. transport, transport insurance and off-loading in the excavation prepared customer-side. The customer guarantees unlimited access to the off-loading site.

Prices valid for delivery within Bulgaria (not including islands).

CIP INCOTERMS® 2010

Depending on country-specific requirements the price and technical parameters can vary.

BG) Version for Bulgaria

The transport costs for release orders and/or orders of individual components will be charged separately.



Transformer Compact Station for SC-CP-Inverter (TCS 800SC-BG)

Valid from: as provided in contract

TCS 800SC-BG (price before options):	2	BG	x	x	x	x	x	x	x	x	x	0	0	xx	The compact station comes with an oil-hermetic transformer for 20 kV is permitted for ambient temperatures from -20°C to +40°C.
Cabinet:			0												Concrete compact station
Voltage level:				0											20 kV
Medium voltage transformer:					1										Transformer with iron core
LV power switch:						0									Without
						1									With
Internal power supply:							0								Without
							1								With
Communit:								0							Without
								1							With
Medium voltage switchgear:									0						Without
									2						Ring connection (3-field)
Surrounding area:										0					Standard
										1					Protection against chemically active substances
Language:													EN		English
													BG		Bulgarian

Comments

Incl. transport, transport insurance and off-loading in the excavation prepared customer-side. The customer guarantees unlimited access to the off-loading site.

Prices valid for delivery within Bulgaria (not including islands).

CIP INCOTERMS® 2010

Depending on country-specific requirements the price and technical parameters can vary.

BG) Version for Bulgaria

The transport costs for release orders and/or orders of individual components will be charged separately.



Transformer Compact Station for SC-CP-Inverter (TCS 630SC-BG)

Valid from: as provided in contract

TCS 630SC-BG (price before options):	1	BG	x	x	x	x	x	x	x	x	0	0	xx	The compact station comes with an oil-hermetic transformer for 20 kV is permitted for ambient temperatures from -20°C to +40°C.
Cabinet:			0											Concrete compact station
Voltage level:				0										20 kV
Medium voltage transformer:					1									Transformer with iron core
LV power switch:					0	1								Without With
Internal power supply:						0	1							Without With
Communit:							0	1						Without With
Medium voltage switchgear:								0	2					Without Ring connection (3-field)
Surrounding area:									0	1				Standard Protection against chemically active substances
Language:													EN BG	English Bulgarian

Comments

Incl. transport, transport insurance and off-loading in the excavation prepared customer-side. The customer guarantees unlimited access to the off-loading site.

Prices valid for delivery within Bulgaria (not including islands).

CIP INCOTERMS® 2010

Depending on country-specific requirements the price and technical parameters can vary.

BG) Version for Bulgaria

The transport costs for release orders and/or orders of individual components will be charged separately.



Transformer Compact Station for SC-CP-Inverter (TCS 500SC-BG)

Valid from: as provided in contract

TCS 500SC-BG (price before options):	0	BG	x	x	x	x	x	x	x	x	0	0	xx	The compact station comes with an oil-hermetic transformer for 20 kV is permitted for ambient temperatures from -20°C to +40°C.
Cabinet:			0											Concrete compact station
Voltage level:			0											20 kV
Medium voltage transformer:				1										Transformer with iron core
LV power switch:					0	1								Without With
Internal power supply:						0	1							Without With
Communit:							0	1						Without With
Medium voltage switchgear:								0	2					Without Ring connection (3-field)
Surrounding area:									0	1				Standard Protection against chemically active substances
Language:													EN	English
													BG	Bulgarian

Comments

Incl. transport, transport insurance and off-loading in the excavation prepared customer-side. The customer guarantees unlimited access to the off-loading site.

Prices valid for delivery within Bulgaria (not including islands).

CIP INCOTERMS® 2010

Depending on country-specific requirements the price and technical parameters can vary.

BG) Version for Bulgaria

The transport costs for release orders and/or orders of individual components will be charged separately.



Transformer Compact Station for SC-CP-Inverter (TCS 1800SC-RO)

Valid from: as provided in contract

and nominal values provided in order															
TCS 1800SC-RO (price before options):	6	RO	x	x	x	x	x	x	x	x	x	0	0	xx	The compact station comes with an oil-hermetic transformer for 20 kV is permitted for ambient temperatures from -20°C to +40°C.
Cabinet:			0												Concrete compact station
Voltage level:				0											20 kV
Medium voltage transformer:					1										Transformer with iron core
LV power switch:					0										Without
					1										With
Internal power supply:						0									Without
						1									With
Communit:							0								Without
							1								With
Medium voltage switchgear:								0							Without
								2							Ring connection (3-field)
Surrounding area:									0						Standard
									1						Protection against chemically active substances
Language:														EN	English
														RO	Romanian

Comments

Incl. transport, transport insurance and off-loading in the excavation prepared customer-side. The customer guarantees unlimited access to the off-loading site.

Prices valid for delivery within Romania (not including islands).

CIP INCOTERMS® 2010

Depending on country-specific requirements the price and technical parameters can vary.

RO) Version for Romania

The transport costs for release orders and/or orders of individual components will be charged separately.



Transformer Compact Station for SC-CP-Inverter (TCS 1600SC-RO)

Valid from: as provided in contract

TCS 1600SC-RO (price before options):	5	RO	x	x	x	x	x	x	x	x	0	0	xx	The compact station comes with an oil-hermetic transformer for 20 kV is permitted for ambient temperatures from -20°C to +40°C.
Cabinet:			0											Concrete compact station
Voltage level:				0										20 kV
Medium voltage transformer:					1									Transformer with iron core
LV power switch:						0								Without
						1								With
Internal power supply:							0							Without
							1							With
Communit:								0						Without
								1						With
Medium voltage switchgear:									0					Without
									2					Ring connection (3-field)
Surrounding area:										0				Standard
										1				Protection against chemically active substances
Language:													EN	English
													RO	Romanian

Comments

Incl. transport, transport insurance and off-loading in the excavation prepared customer-side. The customer guarantees unlimited access to the off-loading site.

Prices valid for delivery within Romania (not including islands).

CIP INCOTERMS® 2010

Depending on country-specific requirements the price and technical parameters can vary.

RO) Version for Romania

The transport costs for release orders and/or orders of individual components will be charged separately.



Transformer Compact Station for SC-CP-Inverter (TCS 1250SC-RO)

Valid from: as provided in contract

TCS 1250SC-RO (price before options):	4	RO	x	x	x	x	x	x	x	x	0	0	xx	The compact station comes with an oil-hermetic transformer for 20 kV is permitted for ambient temperatures from -20°C to +40°C.
Cabinet:			0											Concrete compact station
Voltage level:				0										20 kV
Medium voltage transformer:					1									Transformer with iron core
LV power switch:						0								Without
						1								With
Internal power supply:							0							Without
							1							With
Communit:								0						Without
								1						With
Medium voltage switchgear:									0					Without
									2					Ring connection (3-field)
Surrounding area:										0				Standard
										1				Protection against chemically active substances
Language:													EN	English
													RO	Romanian

Comments

Incl. transport, transport insurance and off-loading in the excavation prepared customer-side. The customer guarantees unlimited access to the off-loading site.

Prices valid for delivery within Romania (not including islands).

CIP INCOTERMS® 2010

Depending on country-specific requirements the price and technical parameters can vary.

RO) Version for Romania

The transport costs for release orders and/or orders of individual components will be charged separately.



Transformer Compact Station for SC-CP-Inverter (TCS 1000SC-RO)

Valid from: as provided in contract

TCS 1000SC-RO (price before options):	3	RO	x	x	x	x	x	x	x	x	0	0	xx	The compact station comes with an oil-hermetic transformer for 20 kV is permitted for ambient temperatures from -20°C to +40°C.
Cabinet:			0											Concrete compact station
Voltage level:				0										20 kV
Medium voltage transformer:					1									Transformer with iron core
LV power switch:						0								Without
						1								With
Internal power supply:							0							Without
							1							With
Communit:								0						Without
								1						With
Medium voltage switchgear:									0					Without
									2					Ring connection (3-field)
Surrounding area:											0			Standard
											1			Protection against chemically active substances
Language:													EN	English
													RO	Romanian

Comments

Incl. transport, transport insurance and off-loading in the excavation prepared customer-side. The customer guarantees unlimited access to the off-loading site.

Prices valid for delivery within Romania (not including islands).

CIP INCOTERMS® 2010

Depending on country-specific requirements the price and technical parameters can vary.

RO) Version for Romania

The transport costs for release orders and/or orders of individual components will be charged separately.



Transformer Compact Station for SC-CP-Inverter (TCS 900SC-RO)

Valid from: as provided in contract

TCS 900SC-RO (price before options):	7	RO	x	x	x	x	x	x	x	x	x	0	0	xx	The compact station comes with an oil-hermetic transformer for 20 kV is permitted for ambient temperatures from -20°C to +40°C.
Cabinet:			0												Concrete compact station
Voltage level:				0											20 kV
Medium voltage transformer:					1										Transformer with iron core
LV power switch:						0									Without
						1									With
Internal power supply:							0								Without
							1								With
Communit:								0							Without
								1							With
Medium voltage switchgear:									0						Without
									2						Ring connection (3-field)
Surrounding area:										0					Standard
										1					Protection against chemically active substances
Language:														EN	English
														RO	Romanian

Comments

Incl. transport, transport insurance and off-loading in the excavation prepared customer-side. The customer guarantees unlimited access to the off-loading site.

Prices valid for delivery within Romania (not including islands).

CIP INCOTERMS® 2010

Depending on country-specific requirements the price and technical parameters can vary.

RO) Version for Romania

The transport costs for release orders and/or orders of individual components will be charged separately.



Transformer Compact Station for SC-CP-Inverter (TCS 800SC-RO)

Valid from: as provided in contract

TCS 800SC-RO (price before options):	2	RO	x	x	x	x	x	x	x	x	x	0	0	xx	The compact station comes with an oil-hermetic transformer for 20 kV is permitted for ambient temperatures from -20°C to +40°C.
Cabinet:			0												Concrete compact station
Voltage level:				0											20 kV
Medium voltage transformer:					1										Transformer with iron core
LV power switch:						0									Without
						1									With
Internal power supply:							0								Without
							1								With
Communit:								0							Without
								1							With
Medium voltage switchgear:									0						Without
									2						Ring connection (3-field)
Surrounding area:										0					Standard
										1					Protection against chemically active substances
Language:														EN	English
														RO	Romanian

Comments

Incl. transport, transport insurance and off-loading in the excavation prepared customer-side. The customer guarantees unlimited access to the off-loading site.

Prices valid for delivery within Romania (not including islands).

CIP INCOTERMS® 2010

Depending on country-specific requirements the price and technical parameters can vary.

RO) Version for Romania

The transport costs for release orders and/or orders of individual components will be charged separately.



Transformer Compact Station for SC-CP-Inverter (TCS 630SC-RO)

Valid from: as provided in contract

TCS 630SC-RO (price before options):	1	RO	x	x	x	x	x	x	x	x	0	0	xx	The compact station comes with an oil-hermetic transformer for 20 kV is permitted for ambient temperatures from -20°C to +40°C.
Cabinet:			0											Concrete compact station
Voltage level:				0										20 kV
Medium voltage transformer:					1									Transformer with iron core
LV power switch:						0								Without
						1								With
Internal power supply:							0							Without
							1							With
Communit:								0						Without
								1						With
Medium voltage switchgear:									0					Without
									2					Ring connection (3-field)
Surrounding area:										0				Standard
										1				Protection against chemically active substances
Language:													EN	English
													RO	Romanian

Comments

Incl. transport, transport insurance and off-loading in the excavation prepared customer-side. The customer guarantees unlimited access to the off-loading site.

Prices valid for delivery within Romania (not including islands).

CIP INCOTERMS® 2010

Depending on country-specific requirements the price and technical parameters can vary.

RO) Version for Romania

The transport costs for release orders and/or orders of individual components will be charged separately.



Transformer Compact Station for SC-CP-Inverter (TCS 500SC-RO)

Valid from: as provided in contract

TCS 500SC-RO (price before options):	0	RO	x	x	x	x	x	x	x	x	0	0	xx	The compact station comes with an oil-hermetic transformer for 20 kV is permitted for ambient temperatures from -20°C to +40°C.
Cabinet:			0											Concrete compact station
Voltage level:				0										20 kV
Medium voltage transformer:					1									Transformer with iron core
LV power switch:						0								Without
						1								With
Internal power supply:							0							Without
							1							With
Communit:								0						Without
								1						With
Medium voltage switchgear:									0					Without
									2					Ring connection (3-field)
Surrounding area:										0				Standard
										1				Protection against chemically active substances
Language:													EN	English
													RO	Romanian

Comments

Incl. transport, transport insurance and off-loading in the excavation prepared customer-side. The customer guarantees unlimited access to the off-loading site.

Prices valid for delivery within Romania (not including islands).

CIP INCOTERMS® 2010

Depending on country-specific requirements the price and technical parameters can vary.

RO) Version for Romania

The transport costs for release orders and/or orders of individual components will be charged separately.



Sunny Central Accessories



SC-XXX-CP-KIT-SMB The SMB connection kit is part of the accessories to connect the Sunny Main Box to the following inverters:

SC 900CP-10
SC 850CP-10
SC 800CP-10
SC 760CP-10
SC 720CP-10
SC 630CP-10
SC 500CP-10

The busbar enables the connection of up to 4 DC cables.

65-1519910011 Concrete base for inverters (Country AU):

SC 900CP-10
SC 850CP-10
SC 800CP-10
SC 760CP-10
SC 720CP-10
SC 630CP-10
SC 500CP-10

65-1519910013 Concrete base for inverters (Country Europe):

SC 900CP-10
SC 850CP-10
SC 800CP-10
SC 760CP-10
SC 720CP-10
SC 630CP-10
SC 500CP-10



41-5326	Cable set 5 m for TCS-SC 3 x 3 x 1 x 240mm ²
41-5327	Cable set 7,5 m for TCS-SC 3 x 3 x 1 x 240mm ²
41-5328	Cable set 10 m for TCS-SC 3 x 3 x 1 x 240mm ²
41-5329	Cable set 15 m for TCS-SC 3 x 3 x 1 x 240mm ²
95-7319	Cable set 10 m for TCS-SC (Country AU)
95-7320	Cable set 15 m for TCS-SC (Country AU)
41-5336	5-meter cable set for TCS-SC 4 x 3 x 1 x 240mm ²
41-5337	7,5-meter cable set for TCS-SC 4 x 3 x 1 x 240mm ²
41-5338	10-meter cable set for TCS-SC 4 x 3 x 1 x 240mm ²
41-5339	15-meter cable set for TCS-SC 4 x 3 x 1 x 240mm ²



Central Inverter Stations

**MV Power Station 2000 SC (MVPS-2000-SC-21)**

Valid from: as provided in contract

**MVPS-2000-SC-21
(price before
options):**

20 Feet container, completely prepared for the integration of central inverters SC-CPXT, MV-transformer, MV-switchgear, LV- and communication components

**MV Power Station 1800 SC (MVPS-1800-SC-21)****MVPS-1800-SC-21
(price before
options):**

20 Feet container, completely prepared for the integration of central inverters SC-CP-XT, MV-transformer, MV-switchgear, LV- and communication components

**MV Power Station 1600 SC (MVPS-1600-SC-21)**

Valid from: as provided in contract

**MVPS-1600-SC-21
(price before
options):**

20 Feet container, completely prepared for the integration of central inverters SC-CPXT, MV-transformer, MV-switchgear, LV- and communication components

**MV Power Station 1250 SC (MVPS-1250-SC-21)**

Valid from: as provided in contract

**MVPS-1250-SC-21
(price before
options):**

20 Feet container, completely prepared for the integration of central inverters SC-CPXT, MV-transformer, MV-switchgear, LV- and communication components

**MV Power Station 1000 SC (MVPS-1000-1SC-21 with 1 x SC1000)**

Valid from: as provided in contract

**MVPS-1000-1SC-21
(price before
options):**

20 Feet container, completely prepared for the integration of central inverters SC-CPXT, MV-transformer, MV-switchgear, LV- and communication components

**MV Power Station 1000 SC (MVPS-1000-2SC-21 with 2 x SC500)**

Valid from: as provided in contract

**MVPS-1000-2SC-21
(price before
options):**

20 Feet container, completely prepared for the integration of central inverters SC-CPXT, MV-transformer, MV-switchgear, LV- and communication components



MV Power Station 1000 SC (MVPS-1000-2SC-21 with 2 x SC500)

Valid from: as provided in contract

[illegible]

Comments

FCA (Incoterms® 2010), Calatafimi Sicily, Italy

**MV Power Station 900 SC (MVPS-900-SC-21)**

Valid from: as provided in contract

**MVPS-900-SC-21
(price before
options):**

20 Feet container, completely prepared for the integration of central inverters SC-CPXT, MV-transformer, MV-switchgear, LV- and communication components

**MV Power Station 800 SC (MVPS-800-SC-21)**

Valid from: as provided in contract

**MVPS-800-SC-21
(price before
options):**

20 Feet container, completely prepared for the integration of central inverters SC-CP-XT, MV-transformer, MV-switchgear, LV- and communication components

**MV Power Station 630 SC (MVPS-630-SC-21)**

Valid from: as provided in contract

**MVPS-630-SC-21
(price before
options):**

20 Feet container, completely prepared for the integration of central inverters SC-CP-XT, MV-transformer, MV-switchgear, LV- and communication components

**MV Power Station 500 SC (MVPS-500-SC-21)**

Valid from: as provided in contract

**MVPS-500-SC-21
(price before
options):**

20 Feet container, completely prepared for the integration of central inverters SC-CP-XT, MV-transformer, MV-switchgear, LV- and communication components

Sunny Central System Technology





Sunny String Monitor SSM8-21-BS

Valid from: as provided in contract

SSM8-21-BS (price before options):	<p>PV array junction box for PV systems, made of UV-resistant, fiberglass-reinforced polyester with degree of protection IP54, suitable for outdoors, wall-mounting with 16 fuse holders on both the plus- and minus sides, DC disconnect and monitored overvoltage protection including remote signaling. 8-channel string-current monitoring including RS485 communication unit for data transmission and -evaluation in the Sunny Central. Connection of two cables per pole via terminal lug to the busbar up to 300 mm² cross-section. Suitable for operating temperatures as low as -25 °C and standby temperatures as low as -40 °C.</p>
Language:	<p>DE German EN English ES Spanish KR Korean IT Italian FR French GR Greek JP Japanese RO Romanian</p>

Sunny String Monitor SSM16-21-BS

Valid from: as provided in contract

SSM16-21-BS (price before options):	<p>PV array junction box for PV systems, made of UV-resistant, fiberglass-reinforced polyester with degree of protection IP54, suitable for outdoors, wall-mounting with 32 fuse holders on both the plus- and minus sides, DC disconnect and monitored overvoltage protection including remote signaling. 16-channel string-current monitoring including RS485 communication unit for data transmission and -evaluation in the Sunny Central. Sealing range of the cable entry plate: 5 mm ... 10.5 mm. Connection of two cables per pole via terminal lug to the busbar up to 300 mm² cross-section. Suitable for operating temperatures as low as -25 °C and standby temperatures as low as -40 °C.</p>
Language:	<p>DE German EN English ES Spanish KR Korean IT Italian FR French GR Greek JP Japanese RO Romanian</p>

**Accessories SSMxx-21-BS**

Valid from: as provided in contract

SSM21-FUSE (price before options):	x	1 pack containing 10 gPV fuses or bridges, 10 x 38 mm, 1000 VDC for SSMxx-21
	1	8 A (1000 V)
	2	10 A (1000 V)
	3	12 A (1000 V)
	4	15 A (1000 V)
	5	20 A (1000 V)
	6	25 A (1000 V)
	7	30 A (1000 V)
	8	Neutral link

PSM21 Base 1058 x 892 x 245 mm for SSMxx-21 for outdoor pillar installation

AFC-300 2 V box terminals with connection lug for the DC output, up to 300 mm² aluminum- or copper cable

**PADCON-CMB16-10**

Padcon DC-Combiner TGA16

PV array junction box suitable for outdoor use for PV systems with system voltages up to 1,000 VDC. Enclosure for wall mounting made of UV-resistant plastic with degree of protection IP54. Equipped with 16 fuse holders on both plus and minus sides, DC disconnect units and type 2 overvoltage protection. Information attached to device and documentation in language English / German / French.
Exclusive string fuses, suitable string fuses (Padcon TGA Fuse) are available as accessories.

PADCON-CMB24-10

Padcon DC-Combiner TGA24

PV array junction box suitable for outdoor use for PV systems with system voltages up to 1,000 VDC. Enclosure for wall mounting made of UV-resistant plastic with degree of protection IP54. Equipped with 24 fuse holders on both plus and minus sides, DC disconnect units and type 2 overvoltage protection. Information attached to device and documentation in language English / German / French.
Exclusive string fuses, suitable string fuses (Padcon TGA Fuse) are available as accessories.

PADCON-CMB32-10

Padcon DC-Combiner TGA32

PV array junction box suitable for outdoor use for PV systems with system voltages up to 1,000 VDC. Enclosure for wall mounting made of UV-resistant plastic with degree of protection IP54. Equipped with 32 fuse holders on both plus and minus sides, DC disconnect units and type 2 overvoltage protection. Information attached to device and documentation in language English / German / French.
Exclusive string fuses, suitable string fuses (Padcon TGA Fuse) are available as accessories.

TGA-FUSE-10

Fuse link 10x38 gPV 10A 1000 VDC

fuse for short circuit and overload protection with 10 A rated power

TGA-FUSE-12

Fuse link 10x38 gPV 12A 1000 VDC

fuse for short circuit and overload protection with 12 A rated power

TGA-FUSE-16

Fuse link 10x38 gPV 16A 1000 VDC

fuse for short circuit and overload protection with 16 A rated power

TGA-FUSE-20

Fuse link 10x38 gPV 20A 1000 VDC

fuse for short circuit and overload protection with 20 A rated power

TGA-FUSE-25

Fuse link 10x38 gPV 25A 1000 VDC

fuse for short circuit and overload protection with 25 A rated power



Communit

Valid from: as provided in contract

Communit-10	x	x	x	x	x	x	x	x	x	x	xx	Communication distribution box for up to 7 communication components, incl. 24 V power supply for connection to 100 ... 240 V AC, 45 ... 65 Hz.
Cabinet:	0 1 3											Wall mounting Base Mounting Mounting in a station
Installation location 1	0 7											Without Customer installation location
Installation location 2		0 3 7										Without WebBox + SensorBox Customer installation location
Installation location 3			0 5									Without Cluster Controller
Network installation location 4				0 1 2 B								Without Switch 8 TX Switch 2 FX-M (SC) 8 TX Switch 2 FX-M (SC) 6 TX MNG
Network installation location 5				0 1 2 B								Without Switch 8 TX Switch 2 FX-M (SC) 8 TX Switch 2 FX-M (SC) 6 TX MNG
Router:					0 1 2 3 4							Without Ethernet UMTS/GSM/GPRS** DSL + modem (Annex B)** DSL + modem (Annex A)**
Power Supply:						0 2						Power supply unit, redundant Power supply unit redundant, buffered
Patch panel:						0 5 6 7 8						no Patch panel 4 CU ETH Patch panel 8 CU ETH Patch panel 4 CU ETH + 6 FO Patch panel 6 FO
Ethernet I/O:							0 1 2					Without Moxa iologik E1240 Moxa iologik E1242
Language:												DE German EN English ES Spanish KR Korean IT Italian FR French GR Greek JP Japanese RO Romanian

Comments

** not to be used outside Europe



GSM-UMTS-OUTAN

Antenna with a 5 m cable and an SMA plug for GSM and UMTS

Communication



**SMA ENERGY METER**

Valid from: as provided in contract

EMETER-10 (price before options):		3 phase, bidirectional measurement unit with SMA Speedwire interface to capture electrical measurements by each phase (direct grid connection up to 63 A)

Sunny Home Manager with Bluetooth® (HM-BT-10)

Valid from: as provided in contract

HM-BT-10 (price before options):	x	x	Sunny Home Manager with Bluetooth® + Speedwire - wireless plant monitoring and intelligent energy management
Power supply:	1		with power supply
		1	Germany , France, Italy , Spain , Czech Republic , Belgium , Netherlands , Greece , Portugal , Austria, Switzerland
Language:		3	Great Britain , Australia

Sunny Home Manager with Bluetooth® set incl. SMA radio-controlled sockets (HM-BT-10-Set)

Valid from: as provided in contract

HM-BT-10-SET (price before options):	x	xx	x	Set consisting of Sunny Home Manager with Bluetooth® + Speedwire and two SMA radio-controlled sockets
Power supply:	1			with power supply
		01		Type of connector CEE7/4; Germany , Austria, Netherlands , Portugal , Greece , Italy , Spain
Male connector:		02		Type of connector CEE7/5; France, Belgium , Czech Republic
Language:		1		Germany , Italy , Spain , Netherlands , Greece , Portugal , Austria, Switzerland, France, Belgium , Czech Republic

**SMA radio-controlled socket with Bluetooth® (BT-SOCKET-10)**

Valid from: as provided in contract

BT-SOCKET-10 (price before options):	xx SMA radio-controlled socket with Bluetooth® - wireless control and energy measurement of loads and increase of Bluetooth® range
Male connector; Language:	01 Type of connector CEE7/4; Germany , Austria, Netherlands , Portugal , Greece , Italy , Spain 02 Type of connector CEE7/5; France, Belgium , Czech Republic

SMA radio-controlled socket value pack (BT-SOCKETSET5-10)

Valid from: as provided in contract

BT-SOCKET-SET5-10 (price before options):	SMA radio-controlled socket with Bluetooth® xx Value pack with 5 SMA radio-controlled sockets
Male connector; Language:	01 Type of connector CEE7/4; Germany , Austria, Netherlands , Portugal , Greece , Italy , Spain 02 Type of connector CEE7/5; France, Belgium , Czech Republic

HM-DO-METERADAPTER

Adapter to read out the optical meter interface according to IEC 62056-21 (D0) with 4-pole plug

**SMA Cluster Controller (CLCON-10)**

Valid from: as provided in contract

CLCON-10 (price before options):		SMA Cluster Controller x Device for the monitoring and control of SMA inverters in decentralized large-scale PV plants with Speedwire network, LC display, top-hat rail mounted, supports max. 75 SMA devices.
Language:	0 1	USA , Canada Germany , France, Italy , Spain , Czech Republic , Belgium , Netherlands , Greece , Portugal , Austria, Switzerland, Japan

SMA Cluster Controller (CLCON-S-10)

Valid from: as provided in contract

CLCON-S-10 (price before options):		x Device for monitoring and controlling SMA inverters in decentralized large-scale PV power plants with Speedwire network, LC-Display, top-hat rail mounting, supports max. 25 SMA devices.
Language:	1	Germany , France, Italy , Spain , Czech Republic , Belgium , Netherlands , Greece , Portugal , Austria, Switzerland

CLCON-PWRSUPPLY Top-hat rail power supply unit 24 V DC / 2.5 A
power supply unit for the SMA Cluster Controller and SMA Inverter Manager, top-hat rail mounted, Input: 100-240 V AC, output: 24 V DC / 2.5 A

not available in Japan and USA

USB-FLASHDRV4GB USB memory stick 4 GB
High Speed USB 2.0 Flash memory, highly reliable industrial quality, water- and dust proof, ESD protected, operating temperature -40°C ... +85°C

USB-FLASHDRV8GB USB memory stick 8 GB
High Speed USB 2.0 Flash memory, highly reliable industrial quality, water- and dust proof, ESD protected, operating temperature -40°C ... +85°C

**Sunny View**

Valid from: as provided in contract

VIEW-10	x	xx	Sunny View Color touch display for plant monitoring of up to 12 SMA inverters

SMA Bluetooth® Repeater

Valid from: as provided in contract

BTREP-IN (price before options):	x	xx	SMA Bluetooth® repeater for increasing the range of SMA Bluetooth® products for use indoors
Power supply:	1		with plug-in power supply
	2		Power Modul, without plug-in power supply, not for USA
Language:			AU Australia (Documentation: English) BE Belgium (Documentation: German, Dutch, French) CZ Czech Republic (Documentation: Czech) DE Germany (Documentation: German) ES Spain (Documentation: Spanish) FR France (Documentation: French) GB Great Britain (Documentation: English) GR Greece (documentation: Greek) IT Italy (Documentation: Italian) NL Netherlands (Documentation: Dutch) PT Portugal (Documentation: Portuguese) US USA (Documentation: English)

Valid from: as provided in contract

BTREP-OUT (price before options):	x	xx	SMA Bluetooth® Repeater Outdoor for increasing the range of SMA Bluetooth® products for use outdoors
Power supply:*	1		with power supply for DIN rail mounting
	2		Power Modul, without power supply for DIN rail mounting
Language:			DE Germany (Documentation: German)

* The option 2 is not valid for the US



PWRM-10-NR Module for the power supply of the SMA Bluetooth® Repeater or the SMA Power Injector with Bluetooth® from following inverters:

STP 15000TL-10

PWRSUPPLY Plug-in power supply (EU, US, UK, AU, KR) for SMA Bluetooth® Repeater, Sunny WebBox, Power Reducer Box, Power Injector of the Sunny SensorBox and Wireless-Set 485-01/02 radio set

Power Reducer Box

Valid from: as provided in contract

POWERREDUCER BOX (price before options):	x	x	xx	Power Reducer Box control device for feed-in and grid management in large-scale PV plants.
Inputs:	1			4 digital inputs
Memory Card:	0 4			none 2 GB SDcard
Language:			DE AU CZ ES	Germany (documentation: German) Australia (documentation: English) Czech Republic (documentation: Czech) Spain (documentation: Spanish)



Sunny WebBox

Valid from: as provided in contract

SUNNYWEBBOX (price before options):	x	x	x	xx	Sunny WebBox Central measurement data acquisition and diagnostic unit for the professional monitoring of the PV plant
SMA COM:	0	2			Without (Communication via Ethernet) RS485
AUX COM:		0			Without (Communication via Ethernet)
Memory Card:		0	3	4	none 1 GB SD Card 2 GB SD Card
Language:					AU Australia (documentation: English) BE Belgium (documentation: German, Dutch, French) CZ Czech Republic (documentation: Czech) DE Germany (documentation: German) ES Spain (documentation: Spanish) FR France (documentation: French) GB Great Britain (documentation: English) GR Greece (documentation: Greek) IT Italy (documentation: Italian) KR Korea (documentation: Korean) NL Netherlands (documentation: Dutch) PT Portugal (documentation: Portuguese)

Sunny WebBox with Bluetooth®

Valid from: as provided in contract

WEBBOX-BT-20 (price before options):	x	x	x	xx	Sunny WebBox with Bluetooth® Wireless Technology Central measurement data acquisition and diagnostic unit for the professional monitoring of the PV plant
SMA COM:	0				incl. Bluetooth® Wireless Technology
Memory Card:		0	3	4	none 1 GB SD Card 2 GB SD Card
Language:					AU Australia (documentation: English) BE Belgium (documentation: German, Dutch, French) CZ Czech Republic (documentation: Czech) DE Germany (documentation: German) ES Spain (documentation: Spanish) FR France (documentation: French) GB Great Britain (documentation: English) GR Greece (documentation: Greek) IT Italy (documentation: Italian) NL Netherlands (documentation: Dutch) PT Portugal (documentation: Portuguese) US USA (documentation: English)



SD-Card 1 GB	1 GB Secure Digital Memory Card for Sunny WebBox, I-Grade
SD-Card 2 GB	2 GB Secure Digital Memory Card for Sunny WebBox, I-Grade
SUNNYWEBBOX-DUMMY	Sunny WebBox Demo, no function
WEBBOX-20-DUMMY	Non-functioning dummy for Sunny WebBox with Bluetooth®

**Sunny SensorBox**

Valid from: as provided in contract

SUNNYSSENSOR (price before options):	x	x	xx	Sunny SensorBox Measuring system for environmental data capture for professional monitoring of the PV plant, incl. integrated irradiation and external module temperature sensor
SMA Power- Injector:*	1			RS485 Power Injector Feed-in unit for power supply via the RS485 communication bus, incl. plug-in power supply and installation material
	2			SMA Power Injector with BLUETOOTH® Feed-in and communication unit for power supply via the RS485 communication bus and connection to the Sunny SensorBox to the SMA Bluetooth communication, incl. plug-in power supply and mounting material
	3			SMA Power Injector with BLUETOOTH® incl. Power Modul Feed-in and communication unit for power supply via the RS485 communication bus and connection to the Sunny SensorBox to the SMA Bluetooth communication, incl. Power Modul for power supply from the SB 3/4/5000TL-21, STP 15000TL-10, (instead of plug-in power supply) and mounting material
Mounting plate:	0			Without
	1			Mounting plate for mounting the Sunny SensorBox on module rail
Language:			AU	Australia (documentation: English)
			BE	Belgium (documentation: German, Dutch, French)
			CZ	Czech Republic (documentation: Czech)
			DE	Germany (documentation: German)
			ES	Spain (documentation: Spanish)
			FR	France (documentation: French)
			GB	Great Britain (documentation: English)
			GR	Greece (documentation: Greek)
			IT	Italy (documentation: Italian)
			KR	Korea (documentation: Korean)
			NL	Netherlands (documentation: Dutch)
			PT	Portugal (documentation: Portuguese)
			US	USA (documentation: English)

* The options 2 + 3 with Bluetooth are not valid for Korea

SEALKIT-SENSOR

Set of replacement sealings for the Sunny SensorBox consisting of 1 x enclosure sealing and 6 x cable gland incl. corresponding sealings



Valid from: as provided in contract

WINDSENSOR (price before options):	xx Wind speed sensor for connection to Sunny SensorBox; 0.8 ... 40 m/s, incl. 3 m connection cable, mounting angle and pole clamp
Language:	AU Australia (documentation: English) BE Belgium (documentation: German, Dutch, French) CZ Czech Republic (documentation: Czech) DE Germany (documentation: German) ES Spain (documentation: Spanish) FR France (documentation: French) GB Great Britain (documentation: English) GR Greece (documentation: Greek) IT Italy (documentation: Italian) KR Korea (documentation: Korean) NL Netherlands (documentation: Dutch) PT Portugal (documentation: Portuguese) US USA (documentation: English)

Wall-Mount-Bracket wall mounting angle for mounting the wind speed sensor to wall, length 35 cm/90°

Valid from: as provided in contract

TEMPSENSOR-AMBIENT (price before options):	xx PT100 ambient temperature sensor for Sunny SensorBox, measuring range -30°C to 80°C incl. mounting materials
Language:	AU Australia (documentation: English) BE Belgium (documentation: German, Dutch, French) CZ Czech Republic (documentation: Czech) DE Germany (documentation: German) ES Spain (documentation: Spanish) FR France (documentation: French) GB Great Britain (documentation: English) GR Greece (documentation: Greek) IT Italy (documentation: Italian) KR Korea (documentation: Korean) NL Netherlands (documentation: Dutch) PT Portugal (documentation: Portuguese) US USA (documentation: English)

TEMPSENSOR-MODULE PT100 module temperature sensor for Sunny SensorBox, incl. 2-component thermally conductive adhesive and 2.5 m connection cable

Monplat-Sensor Mounting plate for mounting the Sunny SensorBox on module rail

Roofan-Sensor Roof bracket for mounting the Sunny SensorBox

Valid from: as provided in contract

METEOSTATION-10 (price before options):	x SMA Meteo Station professional compact weather station with pyranometer for monitoring the PV plant via RS485-communication bus, incl. module-temperature sensor and top-hat rail power supply
Region:	0 USA , Canada 1 EU



Power-Injector RS485 Power Injector supply unit for power supply via the RS485 communication bus, incl. plug-in power supply and mounting materials

Valid from: as provided in contract

BT-485-CON-DEV (price before options):	SMA Power Injector with BLUETOOTH® x Feed-in and communication unit for power supply via the RS485 communication bus and connection to the Sunny SensorBox to the SMA Bluetooth communication, incl. plug-in power supply and mounting material
	0 without plug-in power supply 1 with plug-in power supply 2 incl. Power Modul for power supply from the SB 3/4/5000TL-21, STP 15000TL-10 (instead of plug-in power supply) and mounting material

Communication Accessories

WS485-01-10* Wireless-Set 485-01 radio set
for longer distances with RS485 communication
for operation with Sunny WebBox,
incl. antenna for outside mounting

WS485-02-10* Wireless-Set 485-02 radio set
Extension kit for Wireless-Set 485-01
for second radio link

* except combination of the Sunny Boy Control and inverters type
STP 15000TL-10

Battery Inverter



**Sunny Island 3.0M (SI3.0M-11)**

Valid from: as provided in contract

SI3.0M-11 (price before options):	x	x	x	0	x	x	Battery inverter: 230 VAC/50 Hz; 48 VDC; 3.0 kW (30 min); 2.3 kW (continuous power); incl. battery temperature sensor, com-cable (2 m)
Communication:	0 4 8						Without RS485 Speedwire
User interface:	0 1						With SRC-20 Without SRC-20
Color of lid:		3					yellow (standard), other colors upon request
Documentation:					DE EN ES FR		German English Spanish French
Application:						0 2	On-Grid self consumption Off-Grid

**Sunny Island 4.4M (SI4.4M-11)**

Valid from: as provided in contract

SI4.4M-11 (price before options):	x	x	x	0	x	x	Battery inverter: 230 VAC/50 Hz; 48 VDC; 4.4 kW (30 min); 3.3 kW (continuous power); incl. battery temperature sensor, com-cable (2 m)
Communication:	0 4 8						Without RS485 Speedwire
User interface:	0 1						With SRC-20 Without SRC-20
Color of lid:		3					yellow (standard), other colors upon request
Documentation:					DE EN ES FR		German English Spanish French
Application:						0 2	On-Grid self consumption Off-Grid

**Sunny Island 6.0H (SI6.0H-11)**

Valid from: as provided in contract

SI6.0H-11 (price before options):	x	x	x	0	x	x	Battery inverter: 230 VAC/50 Hz; 48 VDC; 6.0 kW (30 min); 4.6 kW (continuous power); incl. battery temperature sensor, com-cable (2 m)
Communication:	0 4 5 6 8 9						Without RS485 CAN RS485 + CAN Speedwire Speedwire + CAN
User interface:	0 1						With SRC-20 Without SRC-20
Color of lid:			3				yellow (standard), other colors upon request
Documentation:					DE EN ES FR		German English Spanish French
Application:						0 2	On-Grid self consumption Off-Grid



Sunny Island 8.0H (SI8.0H-11)

Valid from: as provided in contract

SI8.0H-11 (price before options):	x	x	x	0	x	x	Battery inverter: 230 VAC/50 Hz; 48 VDC; 8,0 kW (30 min); 6,0 kW (continuous power); incl. battery temperature sensor; com-cable (2 m)
Communication:	0 4 5 6 8 9						Without RS485 CAN RS485 + CAN Speedwire Speedwire + CAN
User interface:	0 1						With SRC-20 Without SRC-20
Color of lid:			3				yellow (standard), other colors upon request
Documentation:					DE EN ES FR		German English Spanish French
Application:						0 2	On-Grid self consumption Off-Grid



Sunny Island Demo

SIX.XHM-DUMMY

Sunny Island SI3.0M/4.4M/6.0H/8.0H demo device, without function

45-9934

Stand system for SB3000HF-3Y, SB5000TL-2Z, STP9000TL-2Y and SIX.XHM-DUMMY

Sunny Island Charger

Valid from: as provided in contract

SIC50-MPT (price before options):	x	x	0	MPP solar charge controller battery voltage: 48 V/24 V/12 V battery current: 50 A/ 50 A/ 50 A nominal power: 2400 W at 48 V, max. PV voltage: 140 V incl. SIC-PB for communication with Sunny Island
Communication:	0			Sunny Island Charger Piggy Back for the communication between Sunny Island Charger and the Sunny Island SI3.0M/4.4M/6.0H/8.0H via sync bus of the Sunny Islands, including 5 m synchronization cable for indoor installation
	1			No communication
Temperature sensor:	0			Without temperature sensor
	1			With external temperature sensor



Multicluste-Boxes

Multicluste-Box 6 (MC-BOX-6.3-11)

Valid from: as provided in contract

MC-BOX-6.3-11

Three-phase Multicluste-Box
230 V/50 Hz for up to 6 SI 6.0H/8.0H,
generator/load connection of 55 kW each, incl. com cable, Documentation: Language package (DE, EN, ES, FR)

Multicluste-Box MC-BOX-12.3

Valid from: as provided in contract

MC-BOX-12.3 (price before options):	0	0	0	0	x	3-phase Multicluste-Box 230 V/50 Hz for up to 12 SI 6.0H/8.0H, generator/PV/load connection with 110 kW each, incl. com-cable
Dokumentation:					DE	German
					EN	English
					ES	Spanish
					FR	French

Multicluste-Box 36 (MC-BOX-36.3-11)

MC-BOX-36.3-11

Three-phase Multicluste-Box
230 V/50 Hz for up to 36 SI 6.0H/8.0H,
generator/load connection of 300 kW each, PV connection of 360 kW, incl. com cable, Documentation: Language package (DE, EN, ES, FR)



Sunny Island Accessories



SI-CONFIG-10-V	SMA Off-Grid Configurator: Program for the design and simulation of off-grid PV plants with SMA components
SRC-20	Control panel Sunny Remote Control for SI3.0M/4.4M/6.0H/8.0H, incl. 128 MB SD card, and 5 m communication cable for indoor installation, mounting material
SI-485PB-NR	RS485 communication interface as a retrofit kit for Sunny Island SI 5048, incl.: 1 x adapter cable white (from RJ45 to 3 open insulated conductors with wire-end ferrules for clamping), 1 x terminator, mounting instructions
SI-COMSMA-NR	RS485 communication interface as retrofit kit for SI3.0M/4.4M/6.0H/8.0H, 1 x 5 m data cable (grey), 1 x adapter cable (white) from RJ45 to 3 open insulated conductors, 1 x terminator (plugged), 1 x screw, mounting instructions
SI-SYSCAN-NR	CAN communication interface as retrofit kit for SI 8.0H/6.0H master device in multicenter systems, 1 x 5 m data cable (yellow), 1 x terminator (plugged), 1 x screw, mounting instructions
SWDMSI-NR10	Speedwire data module as retrofit kit for SI3.0M/4.4M/6.0H/8.0H, 1 x 5 m patch cable, 3 x spacers, 1 x screw, 1 x cable support sleeve, 1 x filler plug, 1 x installation manual
MC-PB	Multicenter communication interface as a retrofit kit for SI 5048 master device (CAN and RS485 communication interface on a Piggy-Back), incl.: 1 x 5 m data cable CAN-Bus (yellow), 1 x 5 m data cable RS485 (grey), 1 x adapter cable (white) from RJ45 to three open insulated conductors, 1 x grounding cable, 2 x termination resistor, mounting instructions
SIC-PB	SIC Piggy Back for the communication between SIC and the SI3.0M/4.4M/6.0H/8.0H via the sync bus of the Sunny Islands, 5 m synchronization cable for indoor installation
SI-COM-RJ45-3	Adapter cables (from RJ45 to 3 open insulated conductors with bootlace ferrules with fasteners) for using RS485 communication between Sunny Island and Sunny WebBox



Battery fuse boxes

BATFUSE-B.01

Valid from: as provided in contract

BATFUSE-B.01 (price before options):	x	xx	2-pole NH1 battery fuse switch disconnecter for one Sunny Island, 3 DC input ports (1 x battery and 2 x Sunny Island Chargers), 1 X auxiliary voltage output with 8 A
Fuse value:	1		2 x 160 A fuse plug for Sunny Island 6.0H with 2 spare fuses
	2		2 x 200 A fuse plug for Sunny Island 8.0H with 2 spare fuses
	4		2 x 80 A fuse plug for Sunny Island 3.0M with 2 spare fuses
	5		2 x 100 A fuse plug for Sunny Island 4.4M with 2 spare fuses
Dokumentation:	01		DE, EN, ES, FR

BATFUSE-B.03

Valid from: as provided in contract

BATFUSE-B.03 (price before options):	x	xx	2-pole NH1 battery fuse switch disconnecter for up to 3 Sunny Island, 6 DC input ports (2 x battery and 4 x Sunny Island Charger), 1 X auxiliary voltage output with 8 A
Fuse value:	1		6 x 160 A fuse plug for Sunny Island 6.0H with 6 spare fuses
	2		6 x 200 A fuse plug for Sunny Island 8.0H with 6 spare fuses
	4		6 x 80 A fuse plug for Sunny Island 3.0M with 6 spare fuses
	5		6 x 100 A fuse plug for Sunny Island 4.4M with 6 spare fuses
Dokumentation:	01		DE, EN, ES, FR



Battery cable sets

DC-CABLE.70-3

2 x 3 m ready to use, double-insulated battery cable type NSGAFöu for connection of the battery or the BatFuse with SI3.0M/4.4M/6.0H/8.0H. Cross-section 70 mm², with narrow cable shoes (M8) pre assembled

DC-CABLE.70-6

2 x 6 m ready to use, double-insulated battery cable type NSGAFöu for connection of the battery or the BatFuse with SI3.0M/4.4M/6.0H/8.0H. Cross-section 70 mm², with narrow cable shoes (M8) pre assembled



SI-LS100-48 3-pole load-shedding contactor with 100 A nominal current (AC-1) with 48 V DC coil for Sunny Island SI3.0M/4.4M/6.0H/8.0H

Measuring shunts for the battery current detection

SI-SHUNT200 Battery current measuring shunt for Sunny Island SI3.0M/4.4M/6.0H/8.0H (200 A nominal current / 60 mV)

SI-SHUNT600 Battery current measuring shunt for Sunny Island SI3.0M/4.4M/6.0H/8.0H (600 A nominal current / 60 mV)

Sunny Island spare parts

BAT-TEMP-SENSOR Reserve battery temperature sensor type KTY with 10 m connection cable for Sunny Island, Sunny Backup or Sunny Island Charger

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