SUNNY BOY 3.0-US / 3.8-US / 5.0-US / 6.0-US / 7.0-US / 7.7-US





Value-Added Improvements

- SunSpec certified technology for cost-effective module-level shutdown
- Advanced AFCI compliant to UL
 1699B for arc fault protection

Reduced Labor

- New Installation Assistant with direct access via smartphone minimizes time in the field
- Advanced communication interface with fewer components creates 50% faster setup and commissioning

Optimized Power Production

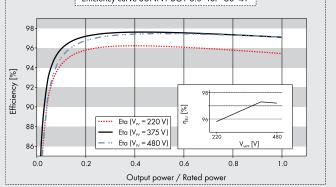
- ShadeFix, SMA's proprietary shade management solution, produces more power than alternatives
- Reduced component count provides
 maximum system reliability
- **Trouble-Free Service**
- SMA Service Mobile App provides simplified, expedited field service
- Equipped with SMA Smart Connected, a proactive service solution that is integrated into Sunny Portal

SUNNY BOY 3.0-US / 3.8-US / 5.0-US / 6.0-US / 7.0-US / 7.7-US

Power with a purpose

The residential PV market is changing rapidly. Your bottom line matters more than ever—so we've designed a superior residential solution to help you decrease costs at every stage of your business operations. The Sunny Boy 3.0-US/3.8-US/5.0-US/6.0-US/7.0-US/7.7-US join the SMA lineup of field-proven solar technology backed by the world's #1 service team. This improved residential solution features ShadeFix, SMA's proprietary technology that optimizes system performance. ShadeFix also provides superior power production with a reduced component count versus competitors, which provides maximum reliability. No other optimized solution generates more power or is as easy as systems featuring SMA ShadeFix and SunSpec certified devices. Finally, SMA Smart Connected will automatically detect errors and initiate the repair and replacement process so that installers can reduce service calls and save time and money.

| Input IDC 201V | Technical data | Sunny Bo | | Sunny Bo | | Sunny Bo | | | | | |
|--|---|------------------|-------------------|---------------------|---------------------|--------------------|------------------|--|--|--|--|
| Max R P voltage range 4400 Wp 6144 Wp B000 Wp Rated MP voltage range 155 - 480 V 195 - 480 V 220 - 480 V Read MPF voltage range 155 - 480 V 100 - 550 V 220 - 480 V Mix DC voltage range 100 V / 125 V 100 - 550 V 200 - 480 V Mix DC voltage range 100 V / 125 V 100 A 300 V/ 330 W 3840 W 5000 W 5000 V Number of APPT Incoder 2/1 0 A 3000 V/ 3300 W 3840 W 5000 V/ 200 V/ </th <th></th> <th>208 V</th> <th>240 V</th> <th>208 V</th> <th>240 V</th> <th>208 V</th> <th>240 V</th> | | 208 V | 240 V | 208 V | 240 V | 208 V | 240 V | | | | |
| Max. CC voltage 600 V Beak MPP voltage range 155 - 460 V 103 - 550 V MIPC operating voltage range 100 V / 125 V Max. Adv. Cloud current per MPP1 10A Max. Adj. per MPP1 10A Max. Adj. cloud current per MPP1 10A / 40A Max. Adj. cloud current per MP1 10A / 40A Max. Adj. cloud current per MP1 10A / 40A Max. Adj. cloud current per MP1 10A / 40A Max. Adj. cloud current per MP1 11/ 2 / 44N Max. Adj. cloud current per MP1 1/ 2 Max. Adj. cloud current per MP1 1/ 2 Max. Adj. c | • • • | | | | | 0.000 | N 14 (| | | | |
| Band MPP adding strong 135 - 480 V 195 - 480 V 220 - 480 V Mark Operating Strong errorg 100 - 550 V 100 - 550 V Max Operating Strong errorg 100 V / 125 V 100 - 550 V Max Schwiding input current per MPPI 18 A 100 V / 125 V Max Schwiding input current per MPPI 18 A 100 V / 125 V Max Schwiding input current per MPPI 18 A 3000 V 3330 V 3840 W 5000 V 5000 V Max AC apparent power 3000 VA 3300 VA 3330 VA 3840 VA 5000 VA 2000 VA < | • | | | | | | | | | | |
| MPPT operating voltage range 100 - 550 V Max. And closel current per MPPT 104 Max. And closel / string per MPPT 104 Max. And closel / string per MPPT 104 Anomalies Conserved 2/1 Anomalies Conserved 3000 W Max. And closel / string per MPPT 104 Max. And closel / string per MPPT 104 Anomalies Conserved 3000 W Max. Ac approver 3000 VA Max. Ac approver 3000 VA Max. Ac approver 3000 VA Max. Approver 3000 VA Ac values conserver 3000 VA Max. Applicat current 113 - 229 V Max. Applicat current 14.5 A Max. Applicat current 14.5 A Max. Applicat current 14.5 A Cic Chicancy 97.2 % Opticat Conserver 97.3 % Output (bases / Inne connections 11/< 4.4 % | | | | | | | | | | | |
| Min. DC voltage / sam voltage 100 V / 125 V Mix. DC voltage / sam voltage 100 V / 125 V Mix. Spont function of MMPT incoder 2/1 3/1 Output (AC) 2/1 3/1 Mix. AC opparent input current per MPPT 18 A AC nominal power 3000 W 3000 V/ 3330 W 3840 W 5000 W 5000 V Mix. AC opparent power 3000 V/ 2330 V/ 240 V/ 208 V/ 240 A 210 J Mix. Michage connections 11/2 K 100 A 160 A 240 A 210 J Diver fortar (co. 8) / hormonics 1/2 K 97.6 % 97.3 % 97.6 % 97.3 % 97.6 % 97.3 % 97.6 % 97.3 % 97.6 % 97.3 % 97.6 % 97.3 % 97.6 % 97.3 % 97.6 % 97.3 % 97.6 % | | | | | | | | | | | |
| Max. operating input current par MPT 10 A Number of MPPT Inocker / string par MPPT Inocker 2/1 3 / 1 Ac nominal power 3000 W 3000 W 3330 W 3840 W 5000 W 5000 V Ac nominal voltage / digutable 208 V / 200 V / 208 V / 200 | | | | | | | | | | | |
| Max. Brid IB A Number of MPT Incoker / sting per MPT Incoker 2/1 3/1 CA noninal power 3000 W 3300 W 3330 W 3840 W 5000 W 5000 W Kar. Acceptorel power 3000 V/ 2000 V/ 200 V/ </td <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> | | | | | | | | | | | |
| Number of MPFI facker 2/1 3 / 1 Output (AC) 3000 W 3300 W 3330 W 3840 W 5000 W 5000 V AC nominal owner 3000 W 3000 V 3300 V 3840 W 5000 V 500 V | | | | | | | | | | | |
| Output (AC) Nominal power 3000 W 3000 W 3330 W 3840 W 5000 W 5000 VA Nominal power 3000 VA 3000 VA 3330 VA 3840 VA 5000 VA 500 VA 500VA 5000 VA 500 VA < | - | | 2 | | A | 2 | / 1 | | | | |
| AC_nominal power 3000 W 3300 W 3330 W 3840 W 5000 W 5000 V Max. AC apparent power 3000 VA 3000 VA 3300 VA 3840 VA 5000 VA <td></td> <td colspan="9">2/1 3/1</td> | | 2/1 3/1 | | | | | | | | | |
| Max. AC apprent power 3000 VA 3300 VA 3330 VA 3330 VA 5000 VA 5000 VA Vaminal voltage / adjustable 208 V/• 240 V/• 208 V/• 240 V/• 208 V/• 240 V/• 200 V/• | • • • | 3000 \\/ | 3000 \/ | 3330 \/ | 3840 \\/ | 5000 \\/ | 5000 \/ | | | | |
| Nominal values 208 V/€ 240 V/€ 208 V/€ 211 - 264 V 201 V/€ 208 V/€ V/€ <td>•</td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> | • | | | | | | | | | | |
| No. volkoge range 183 - 229 V 211 - 264 V 183 - 249 V 210 - 264 V 183 - 261 V 183 - 261 V | | | | | | | | | | | |
| AC grid Requency 60 Hz / 50 Hz Wax. audput current 14.5 A 12.5 A 16.0 A 24.0 A 21.0 / Wax. audput current 1 / < 4 % | | | | | | | | | | | |
| Non: output current 14.5 A 12.5 A 16.0 A 16.0 A 24.0 A 21.0 A Yower factor (cos \$) / hormonics 1/2 1/2 1/2 1/2 Efficiency 97.2 % 97.6 % 97.3 % 97.6 % 97.5 % 97.6 % 97.5 % <td></td> <td>105 - 227 V</td> <td>211 - 204 V</td> <td></td> <td></td> <td>103 - 227 V</td> <td>211 - 204 (</td> | | 105 - 227 V | 211 - 204 V | | | 103 - 227 V | 211 - 204 (| | | | |
| bower factor (cos \$) / hormonics 1 / < 4 % | | 145 A | 125 Δ | | | 240 4 | 21.0 A | | | | |
| Dupply phases / line connections 1 / 2 fiftiency 97.2 % 97.6 % 97.3 % 96.5 % 96.5 % 96.5 % 96.5 % 96.5 % 96.5 % 96.5 % 96.5 % 96.5 % 96.5 % 96.5 % 97.0 % 97.6 % 97.3 % 97.6 % 97.3 % 97.6 % 97.3 % 97.6 % 97.3 % 97.6 % 97.3 % 97.6 % 97.3 % 97.6 % 97.3 % 97.6 % 97.3 % 97.6 % 97.3 % 97.6 % 97.3 % 97.6 % 97.3 % 97.6 % 97.6 % <td>•</td> <td colspan="9"></td> | • | | | | | | | | | | |
| Stifficiency 97.2 % 97.6 % 97.3 % 97.6 % 97.3 % 97.6 % 97.3 % 97.6 % 97.3 % 97.6 % 9 | | | | | | | | | | | |
| Max. efficiency 97.2 % 97.6 % 97.3 % 97.6 % 97. | | | | 1/ | - | | | | | | |
| EEC efficiency 96.0 % 96.5 % 96.5 % 96.5 % 97.0 % Variation devices O <t< td=""><td></td><td>97 2 %</td><td>976%</td><td>97.3 %</td><td>976%</td><td>97.3 %</td><td>976%</td></t<> | | 97 2 % | 976% | 97.3 % | 976% | 97.3 % | 976% | | | | |
| Protection devices C disconnect device / DC reverse polarity protection C disconnect device / DC reverse polarity C disconnect device / DC reverse device / DC r | | | | | | | | | | | |
| DC disconnect device / DC reverse polarity protection ● / ● Scound fault monitoring / Grid monitoring ● Xe Short circuit protection ● Allpole sensitive residual current monitoring unit (RCMU) ● Are fault circuit interrupter (AFCI) ● Protection class / overvoltage category I / IV Seneral data ● Dimensions (W / H / D) in mm (in) 535 x 730 x 198 (21.1 x 28.5 x 7.8) Vackaging dimensions (W / H / D) in mm (in) 600 x 800 x 300 (23.6 x 31.5 x 11.8) Veight / packaging weight 2 bk (57.1b / 30 kg (66 lb) if emperature range: operating / non-operating -25*C+60*C / -40*C+60*C invinomental protection rating NEMA 3R Noise emission (W / H / D) in mm (in) 39 dB(A) if emperature range: operating / non-operating -25*C+60*C / -40*C+60*C invinomental protection rating NEMA 3R Noise emission (W / H / D) 39 dB(A) if emperature range: operating / non-operating -25*C+60*C / -40*C+60*C invinomental protection rating NEMA 3R Sobies emission (S / Q) / cosing 1 if earbords 2 if opology / cooling concept 1 <td></td> <td>70.070</td> <td>70.070</td> <td>/0.0 /0</td> <td>70.0 /0</td> <td>70.070</td> <td>77.0 %</td> | | 70.070 | 70.070 | /0.0 /0 | 70.0 /0 | 70.070 | 77.0 % | | | | |
| Ground fault monitoring / Grid monitoring AC short circuit protection Allpole sensitive residual current monitoring unit (RCMU) Ac fault circuit interrupter (AFCI) Treatection class / overvoltage category I / IV General data Standard fault monitoring / D in mm (in) S35 x 730 x 198 (21.1 x 28.5 x 7.8) Packaging dimensions (W / H / D) in mm (in) Good x 800 x 300 (23.6 x 31.5 x 11.8) Vel (57.1b) / 30 kg (66 lb) Imperature range: operating / non-operating -25° C+60° C /+60° C microannetic protection rating NEMA 3R Noise emission (typical) 39 dB(A) nternal power consumption at night Gopology / cooling concept transformerless / convection Features 2 Siecure Power Supply II Display (2 x 16 characters) 24 GHz WLAN / External WLAN antenna ShadeFix technology for string level optimization Cellular (4G / 3G) / Revenue Grade Meter V / 0 / 0 31 UL 1741, UL 1741 SA incl. CA Rule 21 RSD, UL 16998 Ed. 1, IEEE15427, FCC Part 15 (Class A & B CAN/CSA V22.2 107.1-1, HECO Rule 14H, PV Ropid Shutdown System Equipment Standard features O Optional features Not compatible with SunSpec shutdown | | | | • | | | | | | | |
| AC short circuit protection Whole sensitive residual current monitoring unit (RCMU) Ac foult circuit interrupter (AFCI) Protection class / overvoltage category I / IV General data Dimensions (W / H / D) in mm (in) Stackaging dimensions (W / H / D) in mm (in) Stackaging dimensions (W / H / D) in mm (in) Stackaging dimensions (W / H / D) in mm (in) Acakaging dimensions (W / H / D) in mm (in) Stackaging dimensing (W / H / D) in mm (in) Stackaging dimensing (W / H / D) i | · · · · · · | | | - / | - | | | | | | |
| Allpole sensitive residual current monitoring unit (RCMU) Arc four dircuit interrupter (AFCI) Trotection class / overvoltage category T / V General data Dimensions (W / H / D) in mm (in) Sa5x 730 x 198 (21.1 x 28.5 x 7.8) Tackoging dimensions (W / H / D) in mm (in) Sa5x 730 x 198 (21.1 x 28.5 x 7.8) Tackoging dimensions (W / H / D) in mm (in) Sa5x 730 x 198 (21.1 x 28.5 x 7.8) Tackoging weight Saturation | • • | | | | | | | | | | |
| Arc fault circuit interrupter (AFCI) Totection class / overvoltage category General data Simensions (W / H / D) in mm (in) Sackaging dimensions (W / A / A / A / A / A / A / A / A / A / | | | | | | | | | | | |
| Protection class / overvoltage category I / IV General data Dimensions (W / H / D) in mm (in) 535 x 730 x 198 (21.1 x 28.5 x 7.8) Optimiser of the state of the | | | | | | | | | | | |
| General data Dimensions (W / H / D) in mm (in) 535 x 730 x 198 (21.1 x 28.5 x 7.8) Packaging dimensions (W / H / D) in mm (in) 600 x 800 x 300 (23.6 x 31.5 x 11.8) Weight / packaging weight 26 kg (57.1b) / 30 kg (66.1b) Verget / packaging weight 25 °C+60 °C / -40 °C+60 °C Environmental protection rating NEMA 3R Noise emission (typical) 39 dB(A) Internal power consumption at night < 5 W | | | | 1/ | IV | | | | | | |
| Dimensions (W / H / D) in mm (in) Packaging dimensions (W / H / D) (I / J / J / J / J / J / J / J / J / J / | | | | ., | | | | | | | |
| Packaging dimensions (W / H / D) in mm (in) Weight / packaging weight Iemperature range: operating / non-operating Environmental protection rating Nise emission (typical) Internal power consumption at night Secure Power Supply Display (2 x 16 characters) 2.4 GHz WLAN / External WLAN antenna Standard features Standard feature | | | | 535 x 730 x 198 (| 21.1 x 28.5 x 7.8) | | | | | | |
| Weight / packaging weight 26 kg (57 lb) / 30 kg (66 lb) femperature range: operating / non-operating -25°C+60°C / -40°C+60°C Environmental protection rating NEMA 3R Noise emission (typical) 39 dB(A) nternal power consumption at night < 5 W | | | | | | | | | | | |
| femperature range: operating / non-operating -25°C+60°C / -40°C+60°C Invionemental protection rating NEMA 3R Noise emission (typical) 39 dB(A) internal power consumption at night < 5 W | | | | | | | | | | | |
| Environmental protection rating NEMA 3R Noise emission (typical) 39 dB(A) nternal power consumption at night < 5 W | | | | • • • • | • · · · | | | | | | |
| Noise emission (typical) Internal power consumption at night Tepology / cooling concept Transformerless / convection Features Ethernet ports Secure Power Supply Display (2 x 16 characters) 2.4 GHz WLAN / External WLAN antenna ShadeFix technology for string level optimization Cellular (4G / 3G) / Revenue Grade Meter Warranty: 10 / 15 / 20 years Certificates and approvals Standard features Optional features - Not available & Subject to availability Data at nominal conditions 1) Not compatible with SunSpec shutdown devices 2) Standard in SBX.X-1TP-US-41 SB3.0-1SP-US-41 / SB3.8-1SP-US-41 / SB3.8-1SP-US-41 / SB3.8-1TP-US-41 SB3.0-1SP-US-41 / SB3.0-1TP-US-41 SB3.0-1SP-US-41 / SB3.8-1SP-US-41 / SB3.8-1TP-US-41 SB3.0-1SP-US-41 / SB3.8-1SP-US-41 / SB3.8-1TP-US-41 SB3.0-1SP-US-41 / SB3.0-1TP-US-41 SB3.0-1SP-US-41 / SB3.0-1TP-US-41 SB3.0-1SP-US-41 / SB3.8-1SP-US-41 / SB3.8-1TP-US-41 SB3.0-1SP-US-41 / SB3.0-1TP-US-41 SB3.0-1SP-US-41 / SB3.0-1SP-US-41 / SB3.8-1TP-US-41 SB3.0-1SP-US-41 / SB3.0-1SP-US-41 / SB3.8-1SP-US-41 / SB3.8-1TP-US-41 SB3.0-1SP-US-41 / SB3.0-1SP-US-41 / SB3.8-1SP-US-41 / SB3.8-1SP-US-41 / SB3.0-1SP-US-41 / S | | | | | | | | | | | |
| Internal power consumption at night < 5 W Topology / cooling concept Features Ethernet ports 2 Secure Power Supply 0 Display (2 x 16 characters) 2 2.4 GHz WLAN / External WLAN antenna // 0 ShadeFix technology for string level optimization Cellular (4G / 3G) / Revenue Grade Meter // 0 Warranty: 10 / 15 / 20 years 0 / 0 / 0 3) UL 1741, UL 1741 SA incl. CA Rule 21 RSD, UL 1998, UL 16998 Ed. 1, IEEE1547, FCC Part 15 (Class A & B) CAN/CSA V22.2 107.1-1, HECO Rule 14H, PV Rapid Shutdown System Equipment Standard features 0 Optional features - Not available Subject to availability Data at nominal conditions 1) Not compatible with SunSpec shutdown devices 2) Standard in SBX.X-ITP-US-41 SB3.0-1SP-US-41 / SB3.0-1TP-US-41 SB3.8-1TP-US-41 SB5.0-1SP-US-41 / SB5.0-1SP-US-41 / SB5.0-1TP-U Accessories Certified Revenue Grade Certified Revenue Grade Revenue Grade Certified Revenue Grade Certified Revenue Grade Certified Revenue Grade Certified Revenue Grade Revenue Grade Revenue Grade Revenue Grade Revenue Grade Revenue Grade Revenue Grade Revenue Grade Certified Revenue Grade Revenue Grade Revenue Grade Revenue Grade Revenue Grade Revenue Grade Certified Revenue Grade Revenue Grade Certified Revenue Grade Revenue Grade Revenue Grade Certified Revenue Grade Certified Revenue Grade Revenue Grade Revenue Grade Revenue Grade Certified Revenue Grade Certified Revenue Grade Revenue Grade Certified Revenue Grade Revenue Grade Revenue Grade Revenue Grade Certifi | | | | | | | | | | | |
| Topology / cooling concept transformerless / convection Features 2 Ethernet ports 2 Secure Power Supply 11 Display (2 x 16 characters) 4 2.4 GHz WLAN / External WLAN antenna A / 0 ShadeFix technology for string level optimization 0 Cellular (4G / 3G) / Revenue Grade Meter 0 / 0 21 Warranty: 10 / 15 / 20 years UL 1741, UL 1741 SA incl. CA Rule 21 RSD, UL 1699B Ed. 1, IEEE1547, FCC Part 15 (Class A & B CAN/CSA V22.2 107.1-1, HECO Rule 14H, PV Rapid Shutdown System Equipment • Standard features • Optional features - Not available & Subject to availability Data at nominal conditions 1) Not compatible with SunSpec shutdown devices 2) Standard in SBX.X-ITP-US-41 SB3.0-1SP-US-41 / SB3.8-1TP-US-41 SB5.0-1SP-US-41 / SB5.0-1TP-US-41 Accessories SunSpec Certified Revenue Grade Cellular Modem Kit | | | | | | | | | | | |
| Features 2 Ethernet ports 2 Secure Power Supply 11 Display (2 x 16 characters) - 2.4 GHz WLAN / External WLAN antenna / 0 ShadeFix technology for string level optimization - Cellular (4G / 3G) / Revenue Grade Meter - Warranty: 10 / 15 / 20 years - Certificates and approvals UL 1741, UL 1741 SA incl. CA Rule 21 RSD, UL 1998, UL 1699B Ed. 1, IEEE1547, FCC Part 15 (Class A & B CAN/CSA V22.2 107.1-1, HECO Rule 14H, PV Rapid Shutdown System Equipment • Standard features - Not available • Standard features - Not availabile • Subject to availability - Data at nominal conditions 1) Not compatible with SunSpec shutdown devices • Sb3.0-1SP-US-41 / SB3.0-1TP-US-41 SB3.0-1SP-US-41 / SB3.8-1SP-US-41 / SB3.8-1SP-US-41 / SB3.8-1SP-US-41 / SB3.8-1TP-US-41 Accessories SunSpec Certified Revenue Grade | | | | transformerles | convection | | | | | | |
| Secure Power Supply Isolate Supply Isolate Structure Supply In the second structure Supply Isolate Structure Supply Isolate Structure Structu | | | | | , | | | | | | |
| Secure Power Supply II Display (2 x 16 characters) 2.4 GHz WLAN / External WLAN antenna ShadeFix technology for string level optimization Cellular (4G / 3G) / Revenue Grade Meter () () 2) Warranty: 10 / 15 / 20 years UL 1741, UL 1741 SA incl. CA Rule 21 RSD, UL 1998, UL 1699B Ed. 1, IEEE1547, FCC Part 15 (Class A & B) Certificates and approvals UL 1741, UL 1741 SA incl. CA Rule 21 RSD, UL 1998, UL 1699B Ed. 1, IEEE1547, FCC Part 15 (Class A & B) Certificates and approvals UL 1741, UL 1741 SA incl. CA Rule 21 RSD, UL 1998, UL 1699B Ed. 1, IEEE1547, FCC Part 15 (Class A & B) Certificates and approvals UL 1741, UL 1741 SA incl. CA Rule 21 RSD, UL 1998, UL 1699B Ed. 1, IEEE1547, FCC Part 15 (Class A & B) Can/CSA V22.2 107.1-1, HECO Rule 14H, PV Rapid Shutdown System Equipment Standard features Optional features Not available Subject to availability Data at nominal conditions 1) Not compatible with SunSpec shutdown devices SusSpec Certified SunSpec Certified Revenue Grade Cellular Modem Kit | Ethernet ports | | | 2 | <u> </u> | | | | | | |
| Display (2 x 16 characters) • 2.4 GHz WLAN / External WLAN antenna ▲ / ○ ShadeFix technology for string level optimization • Cellular (4G / 3G) / Revenue Grade Meter • / ○ / ○ 2) Warranty: 10 / 15 / 20 years • / ○ / ○ 3) Certificates and approvals • UL 1741, UL 1741 SA incl. CA Rule 21 RSD, UL 1998, UL 1699B Ed. 1, IEEE1547, FCC Part 15 (Class A & B) • Standard features • Optional features - Not available • Standard features • Optional features - Not available • Standard in sBX.X-1TP-US-41 SB3.0-1SP-US-41 / SB3.0-1TP-US-41 SB5.0-1SP-US-41 / SB5.0-1TP-US-41 Suspec Certified © Cellular Modem Kit | | | | • | 1) | | | | | | |
| 2.4 GHz WLAN / External WLAN antenna ▲ / ○ ShadeFix technology for string level optimization ● Cellular (4G / 3G) / Revenue Grade Meter ○ / ○ 2) Warranty: 10 / 15 / 20 years ● / ○ / ○ 3) Certificates and approvals ● / ○ / ○ 3) Standard features ○ Optional features – Not available Standard features ○ Optional features – Not available Standard features ○ Optional features – Not available Standard features ○ Not compatible with SunSpec shutdown devices 2) Standard in SBX.X-1TP-US-41 Sb3.0-1SP-US-41 / SB3.0-1SP-US-41 / SB3.0-1SP-US-41 / SB3.8-1SP-US-41 / SB3.8-1SP-US-41 / SB5.0-1SP-US-41 / SB | | • | | | | | | | | | |
| Cellular (4G / 3G) / Revenue Grade Meter Warranty: 10 / 15 / 20 years Certificates and approvals Standard features Optional features – Not available & Subject to availability Data at nominal conditions 1) Not compatible with SunSpec shutdown devices 2) Standard in SBX.X-1TP-US-41 SB3.0-1SP-US-41 / SB3.0-1TP-US-41 / SB3.8-1SP-US-41 / SB3.8-1TP-US-41 / SB5.0-1SP-US-41 / SB5.0-1SP-US-41 / SB5.0-1TP-US-41 / SB5.0-1SP-US-41 / SB5.0-1SP-US-41 / SB5.0-1SP-US-41 / SB5.0-1TP-US-41 / SB5.0-1SP-US-41 / SB5.0-1SP-US-41 / SB5.0-1TP-US-41 / SB5.0-1SP-US-41 / SB5.0-1SP-US-41 / SB5.0-1SP-US-41 / SB5.0-1TP-US-41 / SB5.0-1SP-US-41 / SB5.0-1SP-US-4 | | ▲/ 0 | | | | | | | | | |
| Cellular (4G / 3G) / Revenue Grade Meter Warranty: 10 / 15 / 20 years Certificates and approvals • Standard features • Optional features • Not available • Standard features • Not compatible with SunSpec shutdown devices • Standard in SBX.X-1TP-US-41 Type designation • External WLAN antenna • SunSpec Certified • Cellular Modem Kit | ShadeFix technology for string level optimization | • | | | | | | | | | |
| Certificates and approvals UL 1741, UL 1741 SA incl. CA Rule 21 RSD, UL 1998, UL 1699B Ed. 1, IEEE1547, FCC Part 15 (Class A & B) CAN/CSA V22.2 107.1-1, HECO Rule 14H, PV Rapid Shutdown System Equipment Standard features Optional features Not available Subject to availability Data at nominal conditions 1) Not compatible with SunSpec shutdown devices SB3.0-1SP-US-41 / SB3.0-1TP-US-41 SB3.0-1SP-US-41 / SB3.0-1TP-US-41 SB5.0-1SP-US-41 / SB5.0-1SP-US-41 / SB5.0-1SP-US-41 / SB5.0-1SP-US-41 / SB5.0-1SP-US-41 / SB5.0-1SP-US-41 / SB5.0-1TP-U Accessories External WLAN antenna | Cellular (4G / 3G) / Revenue Grade Meter | | | | | | | | | | |
| CAN/CSA V22.2 107.1-1, HECO Rule 14H, PV Rapid Shutdown System Equipment Standard features Optional features Not available Subject to availability Data at nominal conditions 1) Not compatible with SunSpec shutdown devices SB3.0-1SP-US-41 / SB3.0-1TP-US-41 SB3.8-1SP-US-41 / SB3.8-1TP-US-41 SB5.0-1SP-US-41 / SB5.0-1TP-U Accessories External WLAN antenna SunSpec Certified Cellular Modem Kit | Warranty: 10 / 15 / 20 years | | | • / c | / O 3) | | | | | | |
| CAN/CSA V22.2 107.1-1, HECO Rule 14H, PV Rapid Shutdown System Equipment Standard features Optional features – Not available Subject to availability Data at nominal conditions 1) Not compatible with SunSpec shutdown devices 2) Standard in SBX.X-1TP-US-41 Type designation SB3.0-1SP-US-41 / SB3.0-1TP-US-41 / SB3.8-1SP-US-41 / SB3.8-1TP-US-41 SB5.0-1SP-US-41 / SB5.0-1TP-U Accessories External WLAN antenna | Cortificatos and approvals | | | | | | | | | | |
| Data at nominal conditions 1) Not compatible with SunSpec shutdown devices 2) Standard in SBX.X-1TP-US-41 Type designation SB3.0-1SP-US-41 / SB3.0-1TP-US-41 / SB3.8-1SP-US-41 / SB3.8-1TP-US-41 / SB5.0-1SP-US-41 / SB5.0-1SP-US-41 / SB5.0-1TP-U Accessories SunSpec Certified Revenue Grade Cellular Modem Kit | | | | 7.1-1, HECO Rule 14 | 1H, PV Rapid Shutdo | wn System Equipmen | t | | | | |
| Type designation SB3.0-1SP-US-41 / SB3.0-1TP-US-41 SB3.8-1SP-US-41 / SB3.8-1TP-US-41 SB5.0-1SP-US-41 / SB5.0-1TP-US-41 Accessories External WLAN antenna SunSpec Certified Cellular Modern Kit | | | , | | | | | | | | |
| Accessories External WLAN antenna SunSpec Certified Revenue Grade (1) Cellular Modern Kit | | | | | | | | | | | |
| External WLAN antenna SunSpec Certified Revenue Grade Cellular Modem Kit | ,, | SB3.0-1SP-US-41, | / SB3.0-1TP-US-41 | SB3.8-1SP-US-41 / | SB3.8-1TP-US-41 | SB5.0-1SP-US-41, | / SB5.0-1TP-US-4 | | | | |
| | Accessories | | | | | | | | | | |
| EXTANT-US-40 Receivers Rec | External WLAN antenna EXTANT-US-40 | Rapid Shutdown | | Meter Kit | | | | | | | |



| pay IDC) 200 V | Technical data | Sunny Boy 6.0-US | | Sunny Boy 7.0-US | | Sunny Boy 7.7-US | | | | | |
|--|---|-------------------------------------|-------------|-------------------|--------------------|------------------|------------------|--|--|--|--|
| Max. PL yobuper 9600 Wp 11200 Wp 12320 Wp Nax. DC Yologa 600 V 2232 Vp Rand MPP Yologa range 100 - 550 V 270 - 480 V MSD C Yologa Hart weldage 100 - 750 V 700 V Max. DC yologa / Alter weldage 100 - 750 V 700 V Max. Short ficial functioners per MPT 10 A 700 V Max. Alter function of MPT Incker / Jaing per MPT Incker 3 / 1 700 V/ Comput AC 200 V / 2200 V/ 220 V/ 2200 V/ 220 V/ 220 V/ 220 V/ 220 V/ 220 V/ 2200 V/ 220 V/ 220 V/ | | 208 V | 240 V | 208 V | 240 V | 208 V | 240 V | | | | |
| Max. DC /olloge 600 / Max. DC /olloge range 100 - 560 / Min. DC /olloge / Jant voltage range 100 - 550 / Min. DC /olloge / Jant voltage 100 / 125 / Max. DC /olloge / Jant voltage 100 / 125 / Max. DC /olloge / Jant voltage 3 / 1 Output (AC) 3 / 1 AC nominal power 5200 W 6000 W 6660 W 7000 W 6660 W 7680 W Max. Act opprint power 5200 W 6000 W 6660 W 7000 W 6660 W 7680 W Max. Act opprint power 5200 W 6000 W 6660 W 7000 W 6660 W 7680 W Max. Act opprint power 5200 W 6000 W 6660 W 7000 W 6660 W 7680 W Max. Actigenery 200 V 200 V / 200 V / 220 V / 200 V / | Input (DC) | | | | | | | | | | |
| Binder MPP Collegies range 220 - 480 V 245 - 480 V 270 - 480 V Min: DC voltage range 100 - 550 V 100 - 550 V 100 - 550 V Min: DC voltage range 100 V / 125 V 100 - 550 V 100 - 550 V Min: DC voltage range 100 V / 125 V 100 - 550 V 100 - 550 V Min: DC voltage range 100 V / 125 V 100 V / 125 V 100 V / 125 V Min: Di courrent per MPPI 10 A 31 T 500 V 6600 W 7000 VA 6660 W 7680 W Min: AC coptical reamet power 5200 VA 6000 V/ 200 V/ 240 V/ 208 V/ 240 V/ | Max. PV power | 9600 | 0 Wp | 1120 | 0 Wp | 1232 | 0 Wp | | | | |
| MPPT operating willoge range Min. DC: voltage / start voltage / Min. DC: voltage / start voltage / Max. sporting injust current per MPPT Max. short cicuit current per MPPT AC: nominal voltage / digitable // AC: nominal voltage | Max. DC Voltage | | | | | | | | | | |
| Min. DC willing / start vollage 100 V / 125 V Max. operating input current per MPFT 10 A Max. do critical corrent per MPFT 10 A Max. do critical corrent per MPFT 18 A Number of MPFT Incolar / string per MPFT Incolar 3 / 1 AC. nonlinal power 5200 VA 6000 VX 6660 VX 7000 VA 6660 VX 7680 VA Max. AC opperating over 5200 VA 6000 VV 6660 VX 7000 VA 6660 VX 7680 VA AC nonlinal power 5200 VA 6000 VV 6660 VX 7680 VA 7690 VA 768 VA 768 VA 769 VA 789 VA 789 VA 789 VA 789 VA 75 % 775 % 973 % | Rated MPP Voltage range | 220 - 480 V 245 - 480 V 270 - 480 V | | | | | | | | | |
| Max. appending input current per MPPT 10 A Max. short circuit creater per MPPT 18 A Number of MPT Incoker / sing per MPPT Incoker 3 / 1 Chright Carl 3 / 1 AC nominal power 5200 VA 6000 VA 6660 VA 7000 VA 6660 VA 7680 VA Nack Ac nominal power 5200 VA 6000 VA 6660 VA 7680 VA 7680 VA Nack Ac opponent power 5200 VA 6000 VA 6660 VA 7680 VA 7680 VA Ac onlinal power 5200 VA 6000 VA 6660 VA 7680 VA 7680 VA Ac onlinal power 5200 VA 240 V/• 240 V/• <td< td=""><td>MPPT operating voltage range</td><td></td><td></td><td>100 -</td><td>550 V</td><td></td><td></td></td<> | MPPT operating voltage range | | | 100 - | 550 V | | | | | | |
| Nax. Short schult current par MPF1 18 A Number of MPF1 tracker / string per MPF1 tracker 3 / 1 Oxport IAS) 5200 VA 6600 W 7000 W 6660 W 7000 W 6660 W 7680 VA Max. AC appeter power 5200 VA 6000 V 6660 VA 7000 VA 6660 VA 7680 VA Nominal voltage / adjustable 208 V / • 220 V / • 200 V / • 2 | Min. DC voltage / start voltage | | | | | | | | | | |
| Number of MPF1 tracker / string per MPF1 tracker 3 / 1 Output (AC) A. fonninal onloger / Ac nonlinal power 5200 VA 6000 VA 6660 VA 7000 VA 6660 VA 7680 VA Ac nonlinal voltage / adjustable 208 V / • 240 V / • 228 V / • 240 V / • 280 V / • 260 V / • | Max. operating input current per MPPT | | | | | | | | | | |
| Output IACI AC. nominal power 5200 VA 6600 VA 7000 VA 6660 VA 7000 VA 6660 VA 7080 VA Naminal valtage / adjuatable 200 VA 2000 VA 2080 V/ 2040 V/ 2080 V/ 2040 V/ 2 | Max. short circuit current per MPPT | | | | | | | | | | |
| AC nominal power AC nominal power AC nominal power S200 W AC Nominal voltage / adjustable 208 V/● 200 | Number of MPPT tracker / string per MPPT tracker | | | | | | | | | | |
| Max. AC opporent power 5200 VA 6000 VA 6660 VA 7000 VA 6660 VA 7080 VA Nominol voltage / adjustable 208 V/● 240 V/● 208 V/● | Output (AC) | | | | | | | | | | |
| Nominal voltage / adjustable 208 V/● 240 V/● 183 - 229 V 211 - 264 V 32.0 A | AC nominal power | 5200 W | 6000 W | 6660 W | 7000 W | 6660 W | 7680 W | | | | |
| AC walrage range 183 - 229 V 211 - 264 V 32.0 A | Max. AC apparent power | 5200 VA | 6000 VA | 6660 VA | 7000 VA | 6660 VA | 7680 VA | | | | |
| AC gird frequency 60 Hz / 50 Hz Max. volupt current 250 A 250 A 32.0 A 29.2 A 32.0 A 32.0 A Power factor (cos 4) / harmonics 1 / < 4% | Nominal voltage / adjustable | 208 V / • | 240 V / • | 208 V / • | 240 V / • | 208 V / • | 240 V / • | | | | |
| Max. output current 25.0 A 25.0 A 32.0 A 29.2 A 32.0 A 32.0 A Power factor [cos \$h] / harmonics 1 / < 4 % | AC voltage range | 183 - 229 V | 211 - 264 V | 183 - 229 V | 211 - 264 V | 183 - 229 V | 211 - 264 \ | | | | |
| Max. output current 25.0 A 25.0 A 32.0 A 29.2 A 32.0 A 32.0 A Power factor [cos \$h] / harmonics 1 / < 4 % | AC grid frequency | | | 60 Hz / | ′ 50 Hz | | | | | | |
| Power factor (cos ¢) / harmonics 1 / < 4 % | Max. output current | 25.0 A | 25.0 A | 32.0 A | 29.2 A | 32.0 A | 32.0 A | | | | |
| Output phases / line connections 1 / 2 Efficiency 97.3 % 97.7 % 97.3 % 97.9 % 97.3 % 97.9 % 97.3 % 97.9 % 97.3 % 97.9 % 97.3 % 97.9 % 97.3 % 97.9 % 97.3 % 97.9 % 97.3 % 97.9 % 97.3 % 97.9 % 97.3 % 97.9 % 97.3 % 97.9 % 97.3 % 97.9 % 97.3 % 97.9 % 97.3 % 97.9 % 97.3 % 97.9 % 97.3 % 97.9 % 97.3 % 97.9 % 97.3 % 97.9 % 96.5 % 97.0 % 96.5 % 97.0 % 96.5 % 97.0 % 96.5 % 97.0 % 96.5 % 97.0 % 96.5 % 97.0 % 96.5 % 97.0 % 96.5 % 97.0 % 96.5 % 97.0 % 96.5 % 97.0 % 96.5 % 97.0 % 96.5 % 97.0 % 96.5 % 97.0 % 96.5 % 97.0 % 96.5 % 97.0 % 96.5 % 97.0 % 96.5 % 97.0 % 96.5 % 97.0 % % 97.0 % % 10 10 % 10 % | Power factor (cos φ) / harmonics | | | 1/< | 4 % | | | | | | |
| Efficiency 97.3 % 97.7 % 97.3 % 97.9 % 97.3 % 97. | Output phases / line connections | | | | | | | | | | |
| Max. efficiency 97.3 % 97.7 % 97.3 % 97.9 % 97.3 % 97.9 % 97.3 % 97.9 % 97.3 % 97.9 % 97.3 % 97.0 % 96.5 % 97.0 % 96. | Efficiency | | | | | | | | | | |
| CEC efficiency 96.5 % 97.0 % Dible pole port wish the monitoring mint (m | , | 97.3 % | 97.7 % | 97.3 % | 97.9 % | 97.3 % | 97.5 % | | | | |
| Protection devices Childsconnect device / DC reverse polarity protection Critication of device / DC reverse polarity protection Childsconnect device / DC reverse polarity polarity polarity polarity polarity polareverse polarity polareverse polarity polarity polarity polarity po | | | 97.0 % | 96.5 % | | 96.5 % | 97.0 % | | | | |
| DC disconnect device / DC reverse polarity protection Ground foult monitoring / Grid monitoring AC short circuit protection AC short circuit protection AC short circuit protection AC short circuit interrupter (AFCI) Frotection class / overvoltage category I / W General data Dimensions (W / H / D) in mm (in) S35 x 730 x 198 (21.1 x 28.5 x 7.8) Reckaging weight S35 x 730 x 198 (21.1 x 28.5 x 7.8) Reckaging weight S00 x 800 x 300 (23.6 x 31.5 x 11.8) Weight / packaging weight S45 dB(A) S45 dB(A) A5 dB | | | | | | | | | | | |
| Ground fault monitoring / Grid monitoring AC short circuit protection Allpole sensitive residual current monitoring unit (RCMU) Ar fault circuit interrupter (AFCI) Protection class / overvoltage category I / IV General data Dimensions (W / H / D) in mm (in) Status (SW / H / D) in mm (in) Status (SW / H / D) in mm (in) Meight / packaging weight Iemperature ronge: operating / non-operating Environmental protection rating Noise emission (typical) Internal protection rating Noise emission (typical) Status (SW / H / D) in mm (in) Status (SW / H / D) (SW | DC disconnect device / DC reverse polarity protection | | | • / | • | | | | | | |
| AC short circuit protection All pole sensitive residual current monitoring unit (RCMU) Arc fault circuit interrupter (AFCI) Arc fault circuit interrupter (AFCI) Fortection class / overvoltage category I / IV General data Dimensions (W / H / D) in mm (in) So 35 x 730 x 198 (21.1 x 28.5 x 7.8) Packaging Dimensions (W / H / D) in mm (in) So 35 x 730 x 198 (21.1 x 28.5 x 7.8) Packaging weight So 2 x 30 x 198 (21.1 x 28.5 x 7.8) Packaging weight So 2 x 30 x 198 (21.1 x 28.5 x 7.8) Packaging weight So 2 x 30 x | · · · · · · · | • | | | | | | | | | |
| Allpole sensitive residual current monitoring unit (RCMU) Arc fault circuit interrupter (AFCI) Protection class / overvoltage category I / IV General data Dimensions (W / H / D) in mm (in) S35 x 730 x 198 (21.1 x 28.5 x 7.8) Packaging Dimensions (W / H / D) in mm (in) S35 x 730 x 198 (21.1 x 28.5 x 7.8) Packaging weight Deckaging weight Category Deckaging weight Safe x 26 kg (57 lb) / 30 kg (66 lb) Temperature range: operating / non-operating Protection rating Noise emission (kpical) Safe x 26 kg (57 lb) / 30 kg (66 lb) Temperature range: operating / non-operating Protection rating Noise emission (kpical) Safe x 26 kg (57 lb) / 30 kg (66 lb) Temperature range: operating / non-operating Protection rating Noise emission (kpical) Safe x 26 kg (57 lb) / 30 kg (66 lb) Temperature range: operating / non-operating Protection rating Noise emission (kpical) Safe x 26 kg (57 lb) / 30 kg (66 lb) Temperature range: operating / non-operating Protection rating Noise emission (kpical) Safe x 26 kg (57 lb) / 30 kg (66 lb) Temperature range: operating / non-operating Protection rating Noise emission (kpical) Safe x 26 kg (57 lb) / 30 kg (66 lb) Temperature range: operating / non-operating Protection rating Noise emission (kpical) Safe x 26 kg (57 lb) / 30 kg (66 lb) Temperature range: operating / non-operating Protection rating Noise emission (kpical) Safe x 26 kg (57 lb) / 30 kg (66 lb) Temperature range: operating / non-operating Protection rating Protection rating Protection rating Noise emission (kpical) Safe x 26 kg (57 lb) / 30 kg (66 lb) Safe x 26 kg (57 lb) / 30 kg (66 lb) Safe x 26 kg (57 lb) / 30 kg (66 lb) Safe x 26 kg (57 lb) / 30 kg (66 lb) Safe x 26 kg (57 lb) / 30 kg (66 lb) Safe x 26 kg (57 lb) / 30 kg (66 lb) Safe x 26 kg (57 lb) / 30 kg (66 lb) Safe x 26 kg (57 lb) / 30 kg (| | | | | | | | | | | |
| Arc fault circuit interrupter (AFCI) Protection class / overvoltage category I / W General data U General data | - | | | | | | | | | | |
| Protection class / overvoltage category 1 / IV General data Dimensions (W / H / D) in mm (in) 535 x 730 x 198 (21.1 x 28.5 x 7.8) Packaging Dimensions (W / H / D) in mm (in) 600 x 800 x 300 (23.6 x 31.5 x 11.8) Weight / packaging weight 26 kg (57 lb) / 30 kg (66 lb) Temperature range: operating / non-operating -25°C +60°C / -40°C +60°C Environmental protection rating NEMA 3R Noise emission (typical) 39 dB(A) 45 dB(A) Internal power consumption at night <5 W Topology / cooling concept transformerless / convection transformerless / fan Features Ethernet ports Secure Power Supply Display (2 x 16 characters) 2.4 GHz WLAN / External WLAN antenna ShadeFix technology for string level optimization Cellular (4G / 3G) / Revenue Grade Meter Warranty: 10 / 15 / 20 years Certificates and approvals VI 1741, UL 1741 SA incl. CAR VIE 21 RSD, UL 1998, UL 16998 Ed. 1, IEEE1547, FCC Part 15 (Class A & B.), CAN/CSA V22.2 107.1-1, HECO Rule 21 RSD, UL 1998, UL 16998 Ed. 1, IEEE1547, FCC Part 15 (Class A & B.), CAN/CSA V22.2 107.1-1, HECO Rule 14H, PV Rapid Shutdown System Equipment | | | | | | | | | | | |
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| Dimensions (W / H / D) in mm (in) 535 x 730 x 198 (21.1 x 28.5 x 7.8) Packaging Dimensions (W / H / D) in mm (in) 600 x 800 x 300 (23.6 x 31.5 x 11.8) Weight / packaging weight 26 kg (57 lb) / 30 kg (66 lb) Temperature range: operating / non-operating -25°C+60°C / -40°C+60°C Environmental protection rating NEMA 3R Noise emission (typical) 39 dB(A) 45 dB(A) Ihernal power consumption at night < 5 W | | | | ., | | | | | | | |
| Packaging Dimensions (W / H / D) in mm (in) 600 x 800 x 300 (23.6 x 31.5 x 11.8) Weight / packaging weight 26 kg (57 lb) / 30 kg (66 lb) Temperature range: operating / non-operating -25°C+60°C / -40°C /+60°C Environmental protection rating NEMA 3R Noise emission (typical) 39 dB(A) 45 dB(A) Internal power consumption at night <5 W | | | | 535 x 730 x 198 (| 21.1 x 28.5 x 7.8) | | | | | | |
| Weight / packaging weight 26 kg (57 lb) / 30 kg (66 lb) Temperature range: operating / non-operating -25°C+60°C / -40°C+60°C Environmental protection rating NEMA 3R Noise emission (typical) 39 dB(A) 45 dB(A) Internal power consumption at night <5 W | | | | | | | | | | | |
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| Internal power consumption at night < 5 W Topology / cooling concept transformerless / convection transformerless / fan Features Ethernet ports 2 Secure Power Supply 0 11 Display (2 x 16 characters) 2 2.4 GHz WLAN / External WLAN antenna \ / 0 ShadeFix technology for string level optimization 0 Cellular (4G / 3G) / Revenue Grade Meter 0 / 0 21 Warranty: 10 / 15 / 20 years 0 / 0 / 0 31 Certificates and approvals UL 1741, UL 1741 SA incl. CA Rule 21 RSD, UL 1998, UL 1699B Ed. 1, IEEE 1547, FCC Part 15 (Class A & B), CAN/CSA V22.2 107.1-1, HECO Rule 14H, PV Rapid Shutdown System Equipment • Standard features 0 Optional features - Not available \ Subject to availability Data at nominal conditions 1) Not compatible with SunSpec shutdown devices 2) Standard in SBX.X-1TP-US-41 | | | | | | | | | | | |
| Topology / cooling concept transformerless / convection transformerless / fan Features Ethernet ports 2 Ethernet ports 2 Secure Power Supply 11 Display (2 x 16 characters) - 2.4 GHz WLAN / External WLAN antenna / O ShadeFix technology for string level optimization - Cellular (4G / 3G) / Revenue Grade Meter -/ O Warranty: 10 / 15 / 20 years -/ O Certificates and approvals UL 1741, UL 1741 SA incl. CA Rule 21 RSD, UL 1998, UL 1699B Ed. 1, IEEE 1547, FCC Part 15 (Class A & B), CAN/CSA V22.2 107.1-1, HECO Rule 14H, PV Rapid Shutdown System Equipment • Standard features - Not available A subject to availability Data at nominal conditions 1) Not compatible with SunSpec shutdown devices 2) Standard in SBX.X-1TP-US-41 | | | | | | | | | | | |
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| Ethernet ports 2 Secure Power Supply 1) Display (2 x 16 characters) • 2.4 GHz WLAN / External WLAN antenna / 0 ShadeFix technology for string level optimization • Cellular (4G / 3G) / Revenue Grade Meter 0 / 0 2) Warranty: 10 / 15 / 20 years • / 0 / 0 3) Certificates and approvals UL 1741, UL 1741 SA incl. CA Rule 21 RSD, UL 1998, UL 1699B Ed. 1, IEEE 1547, FCC Part 15 (Class A & B), CAN/CSA V22.2 107.1-1, HECO Rule 14H, PV Rapid Shutdown System Equipment • Standard features • Optional features – Not available • Subject to availability • Subject shutdown devices 2) Standard in SBX.X-1TP-US-41 | | Inditation menes | | | liansionne | | | | | | |
| Secure Power Supply 1) Display (2 x 16 characters) - 2.4 GHz WLAN / External WLAN antenna / 0 ShadeFix technology for string level optimization - Cellular (4G / 3G) / Revenue Grade Meter 0 / 0 2) Warranty: 10 / 15 / 20 years - Certificates and approvals UL 1741, UL 1741 SA incl. CA Rule 21 RSD, UL 1998, UL 1699B Ed. 1, IEEE1547, FCC Part 15 (Class A & B), CAN/CSA V22.2 107.1-1, HECO Rule 14H, PV Rapid Shutdown System Equipment • Standard features - Not available A subject to availability Data at nominal conditions 1) Not compatible with SunSpec shutdown devices 2) Standard in SBX.X-1TP-US-41 | | | | 2 |) | | | | | | |
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| 2.4 GHz WLAN / External WLAN antenna ▲ / ○ ShadeFix technology for string level optimization ● Cellular (4G / 3G) / Revenue Grade Meter ○ / ○ 2) Warranty: 10 / 15 / 20 years ● / ○ / ○ 3) Certificates and approvals UL 1741, UL 1741 SA incl. CA Rule 21 RSD, UL 1998, UL 1699B Ed. 1, IEEE1547, FCC Part 15 (Class A & B), CAN/CSA V22.2 107.1-1, HECO Rule 14H, PV Rapid Shutdown System Equipment ● Standard features ○ Optional features – Not available ▲ Subject to availability Data at nominal conditions 1) Not compatible with SunSpec shutdown devices 2) Standard in SBX.X-1TP-US-41 | | | | | | | | | | | |
| ShadeFix technology for string level optimization Cellular (4G / 3G) / Revenue Grade Meter (/ 0 2) Warranty: 10 / 15 / 20 years (/ 0 / 0 3) Certificates and approvals UL 1741, UL 1741 SA incl. CA Rule 21 RSD, UL 1998, UL 1699B Ed. 1, IEEE1547, FCC Part 15 (Class A & B), CAN/CSA V22.2 107.1-1, HECO Rule 14H, PV Rapid Shutdown System Equipment • Standard features • Optional features – Not available | | | | | | | | | | | |
| Cellular (4G / 3G) / Revenue Grade Meter 0 / 0 21 Warranty: 10 / 15 / 20 years • / 0 / 0 31 Certificates and approvals UL 1741, UL 1741 SA incl. CA Rule 21 RSD, UL 1998, UL 1699B Ed. 1, IEEE1547, FCC Part 15 (Class A & B), CAN/CSA V22.2 107.1-1, HECO Rule 14H, PV Rapid Shutdown System Equipment • Standard features • Optional features - Not available Subject to availability Data at nominal conditions 1) Not compatible with SunSpec shutdown devices 2) Standard in SBX.X-1TP-US-41 | | | | | | | | | | | |
| Warranty: 10 / 15 / 20 years / 0 / 0 3) UL 1741, UL 1741 SA incl. CA Rule 21 RSD, UL 1998, UL 1699B Ed. 1, IEEE1547, FCC Part 15 (Class A & B), CAN/CSA V22.2 107.1-1, HECO Rule 14H, PV Rapid Shutdown System Equipment • Standard features • Optional features • Not available • Subject to availability Data at nominal conditions 1) Not compatible with SunSpec shutdown devices 2) Standard in SBX.X-1TP-US-41 | | | | | | | | | | | |
| Certificates and approvals • Standard features • Optional features - Not available • Standard features 1) Not compatible with SunSpec shutdown devices 2) Standard in SBX.X-1TP-US-41 | | | | | | | | | | | |
| CAN/CSA V22.2 107.1-1, HECO Rule 14H, PV Rapid Shutdown System Equipment Standard features Optional features – Not available Subject to availability Data at nominal conditions 1) Not compatible with SunSpec shutdown devices 2) Standard in SBX.X-1TP-US-41 | , , , , | | | | | | | | | | |
| ● Standard features ○ Optional features — Not available ▲ Subject to availability Data at nominal conditions 1) Not compatible with SunSpec shutdown devices 2) Standard in SBX.X-1TP-US-41 | Certificates and approvals | | | | | | | | | | |
| Data at nominal conditions 1) Not compatible with SunSpec shutdown devices 2) Standard in SBX.X-1TP-US-41 | • Standard features • Optional features - Not availa | | | | , | eysion Equipmen | | | | | |
| | | | , | P-US-41 | | | | | | | |
| | Type designation | | | | / SB7.0-1TP-US-41 | SB7.7-1SP-US-41 | / SB7.7-1TP-US-4 | | | | |

THE SMA ENERGY SYSTEM HOME

The SMA Energy System Home combines legendary SMA inverter performance and SunSpec certified shutdown devices in one cost-effective, comprehensive package. In addition, SMA ShadeFix technology optimizes power production and provides greater reliability than alternatives.

This rapid shutdown solution fulfills UL 1741, NEC 2014, and NEC 2017 requirements and is certified to the power line-based SunSpec Rapid Shutdown communication signal over DC wires, making it the most simple and cost-effective rapid shutdown solution on the market.

Visit www.SMA-America.com for more information.







SIMPLE, FLEXIBLE DESIGN

Speed the completion of customer proposals and maximize the efficiency of your design team with the Sunny Boy-US series, which provides a new level of flexibility in system design by offering:

- » Hundreds of stringing configurations and multiple independent MPPTs
- » SMA's proprietary ShadeFix technology optimizes power production
- » Diverse application options including on- and off-grid compatibility



#1 INVERTER



VALUE-DRIVEN SALES ENABLEMENT

SMA wants to enable your sales team by arming them with an abundance of feature/ benefit support. Show your customers the value of the Sunny Boy-US series by utilizing:

- » The opportunity to join the SMA PowerUP network of installers who receive in-depth training, enhanced service, and prioritized marketing support
- » SMA's 40 year history and status as the #1 global inverter manufacturer instills homeowners with peace of mind and the long-term security they demand from a PV investment
- » The most economical solution for shade mitigation with superior power production

IMPROVED STOCKING AND ORDERING

Ensure that your back office business operations run smoothly and succinctly while mitigating potential errors. The Sunny Boy-US series can help achieve cost savings in these areas by providing:

- » An integrated DC disconnect that simplifies equipment stocking and allows for a single inverter part number
- » All communications integrated into the inverter, eliminating the need to order additional equipment





STREAMLINED INSTALLATION AND COMMISSIONING

Expedite your operations in the field by taking advantage of the new Sunny Boy's installer-friendly feature set including:

- » Direct access via smartphone and utilization of SMA's Installation Assistant, which minimizes time/labor spent in the field and speeds the path to commissioning
- » Simple commissioning and monitoring setup in a single online portal
- » The fastest, easiest installation thanks to SMA ShadeFix and SunSpec certified shutdown devices



SUPERIOR SERVICE

SMA understands the factors that contribute to lifetime PV ownership cost, that's why the Sunny Boy-US series was designed for maximum reliability and backstopped by an unmatched service offering. Benefit from:

- » SMA Smart Connected, a proactive service solution integrated into Sunny Portal that automatically detects errors and initiates the repair and replacement process
- » The SMA Service Mobile App, which provides simplified, expedited field service