

# Product data sheet

Specifications



## Circuit breaker, ComPacT NSX250F, 36kA/415VAC, 4 poles 3D (neutral not protected), TMD trip unit 250A

C25F6TM250

### Main

|  |   |
|--|---|
| Range  | ComPacT new generation  |
| Product name   | ComPacT NSX new generation  |
| Device short name                                    | NSX250F   |
| Product or component type                            | Circuit breaker   |
| Device application                                   | Distribution  |
| Poles description                                    | 4P  |
| Protected poles description                          | 3D  |
| Neutral position                                     | Left  |
| [In] rated current                                   | 250 A at 40 °C  |
| [Ue] rated operational voltage                       | 690 V AC 50/60 Hz   |
| Network type   | AC  |
| Network frequency                                    | 50/60 Hz  |
| Suitability for isolation                            | Yes conforming to EN/IEC 60947-2  |
| Utilisation category                                 | Category A  |
| [Icu] rated ultimate short-circuit breaking capacity | 85 kA Icu at 220/240 V AC 50/60 Hz conforming to IEC 60947-2<br>36 kA Icu at 380/415 V AC 50/60 Hz conforming to IEC 60947-2<br>35 kA Icu at 440 V AC 50/60 Hz conforming to IEC 60947-2<br>30 kA Icu at 500 V AC 50/60 Hz conforming to IEC 60947-2<br>22 kA Icu at 525 V AC 50/60 Hz conforming to IEC 60947-2<br>8 kA Icu at 660/690 V AC 50/60 Hz conforming to IEC 60947-2<br>35 kA at 480 V AC 50/60 Hz conforming to UL 508<br>15 kA at 600 V AC 50/60 Hz conforming to UL 508 |
| Performance level                                    | F 36 kA 415 V AC  |
| Trip unit name                                       | TM-D  |
| Trip unit technology                                 | Thermal-magnetic  |
| Trip unit protection functions                       | LI  |
| Control type   | Toggle  |
| Circuit breaker mounting mode                        | Fixed   |

### Complementary

|  |                   |
|--|-------------------|
| [Ui] rated insulation voltage          | 800 V AC 50/60 Hz |
| [Uimp] rated impulse withstand voltage | 8 kV              |

|  |   |
|--|---|
| <b>[Ics] rated service short-circuit breaking capacity</b>       | 85 kA at 220/240 V AC 50/60 Hz conforming to IEC 60947-2<br>36 kA at 380/415 V AC 50/60 Hz conforming to IEC 60947-2<br>35 kA at 440 V AC 50/60 Hz conforming to IEC 60947-2<br>30 kA at 500 V AC 50/60 Hz conforming to IEC 60947-2<br>22 kA at 525 V AC 50/60 Hz conforming to IEC 60947-2<br>8 kA at 660/690 V AC 50/60 Hz conforming to IEC 60947-2 |
| <b>Mechanical durability</b>                                     | 20000 cycles  |
| <b>Electrical durability</b>                                     | 20000 cycles at 440 V In/2<br>10000 cycles at 440 V In<br>10000 cycles at 690 V In/2<br>5000 cycles at 690 V In   |
| <b>Power dissipation per pole</b>                                | 18.75 W   |
| <b>Mounting support</b>  | Backplate   |
| <b>Mounting position</b>   | Horizontal and vertical<br>Flat on the back   |
| <b>Upside connection</b>   | Front   |
| <b>Downside connection</b>                                       | Front   |
| <b>Connection pitch</b>  | 35 mm   |
| <b>Protection type</b>   | L : for overload protection (thermal)<br>I : for short-circuit protection (magnetic)  |
| <b>Trip unit rating</b>  | 250 A at 40 °C  |
| <b>Long-time pick-up adjustment type Ir (thermal protection)</b> | Adjustable  |
| <b>[Ir] long-time protection pick-up adjustment range</b>        | 0.7...1 x In  |
| <b>Long-time protection delay adjustment type tr</b>             | Fixed   |
| <b>[Tr] long-time protection delay adjustment range</b>          | 120...400 s at 1.5 x In<br>15 s at 6 x Ir   |
| <b>Neutral protection settings</b>                               | No protection (3D)  |
| <b>Instantaneous protection pick-up adjustment type li</b>       | Adjustable  |
| <b>[li] instantaneous protection pick-up adjustment range</b>    | 5...10 x In   |
| <b>Earth-leakage protection</b>                                  | Without   |
| <b>Number of slots for electrical auxiliaries</b>                | 5 slot(s)   |
| <b>Width (W)</b>   | 140 mm  |
| <b>Height (H)</b>  | 161 mm  |
| <b>Depth (D)</b>   | 86 mm   |
| <b>Net weight</b>  | 2.8 kg  |
| <b>Environment</b>   |   |
| <b>Standards</b>   | EN/IEC 60947  |
| <b>Product certifications</b>                                    | CCC<br>EAC<br>Marine  |
| <b>Overvoltage category</b>                                      | Class II  |
| <b>Electrical shock protection class</b>                         | Class II  |
| <b>Pollution degree</b>  | 3 conforming to IEC 60664-1   |
| <b>IP degree of protection</b>                                   | IP40 conforming to IEC 60529  |
| <b>IK degree of protection</b>                                   | IK07 conforming to IEC 62262  |

|                                       |  |
|---------------------------------------|--|
| Ambient air temperature for operation | -25...70 °C  |
| Ambient air temperature for storage   | -50...85 °C  |
| Relative humidity                     | 0...95 %   |
| Operating altitude                    | 0...2000 m without derating<br>2000 m...5000 m with derating |

## Packing Units

|                              |          |
|------------------------------|----------|
| Unit Type of Package 1       | PCE      |
| Number of Units in Package 1 | 1        |
| Package 1 Height             | 14.4 cm  |
| Package 1 Width              | 14.7 cm  |
| Package 1 Length             | 19.6 cm  |
| Package 1 Weight             | 2.628 kg |
| Unit Type of Package 2       | S03      |
| Number of Units in Package 2 | 3        |
| Package 2 Height             | 30.0 cm  |
| Package 2 Width              | 30.0 cm  |
| Package 2 Length             | 40.0 cm  |
| Package 2 Weight             | 8.264 kg |

## Offer Sustainability

|                            |   |
|----------------------------|---|
| Sustainable offer status   | Green Premium product   |
| REACH Regulation           | <a href="#">REACH Declaration</a>   |
| EU RoHS Directive          | Compliant<br><a href="#">EU RoHS Declaration</a>  |
| Mercury free               | Yes   |
| China RoHS Regulation      | <a href="#">China RoHS declaration</a><br>Product out of China RoHS scope. Substance declaration for your information   |
| RoHS exemption information | <a href="#">Yes</a>   |
| Environmental Disclosure   | <a href="#">Product Environmental Profile</a>   |
| Circularity Profile        | <a href="#">End of Life Information</a>   |
| PVC free                   | Yes   |
| California proposition 65  | WARNING: This product can expose you to chemicals including: Lead and lead compounds, which is known to the State of California to cause cancer and birth defects or other reproductive harm. For more information go to <a href="http://www.P65Warnings.ca.gov">www.P65Warnings.ca.gov</a> |

## Recommended replacement(s)