SafePlus 36 is a completely sealed system with a stainless steel tank containing all the live parts and switching functions. The sealed steel tank with constant atmospheric conditions ensures high reliability, personnel safety, and a virtually maintenance-free system.

The SafePlus 36 system offers two position switch disconnectors using SF6 gas as an arc quenching medium, plus a vacuum circuit-breaker with relay for superior protection.

Features and benefits
- 40.5kV/630A/50Hz (38kV/600A/60Hz)
- 170kV BIL
- Auto-reclosing capability
- Metal-enclosed design
- No exposure of live parts
- Virtually maintenance free
- Dead end outer cone cable termination system
- 16.5 inches / 420 mm wide functional units
- Type tested according to all relevant IEEE and IEC standards
- Manufactured according to ISO 9001, 14001 and OHSAS 18 001
- Carefully selected materials ensure 88% recycling capability for minimal environmental impact
- Rear viewports for visual verification of the two position disconnector status

With its compact, extendable design (each functional unit is only 16.5 inches / 420mm wide), enhanced short circuit capabilities, and optional arc suppressor, SafePlus is tailor-made for any installation that requires reliable, efficient, and safe solutions.

SafePlus is commonly used in Renewable Energy, Pulp and Paper, Food & Beverage, Oil and Gas, Data Centers, Utilities and Power Plants, Transportation, Infrastructure, and more.

Customized features
- Air-insulated cable riser panel
- Internal arc classified according to IEC 62271-200
- Extendable in both directions
- Arc suppressor in gas enclosure
- Arc suppressor in cable compartment
- Arc flash sensor
- Motor operation
- Base frames for cable entry
- Cold climate version
- Low version 66.9 inches / 1700 mm tall
- Current and voltage sensors technology
- Metering solution
## Technical data

<table>
<thead>
<tr>
<th>SafePlus</th>
<th>IEEE C-module</th>
<th>IEEE V-module</th>
<th>IEC C-module</th>
<th>IEC V-module</th>
</tr>
</thead>
<tbody>
<tr>
<td>Rated voltage (kV)</td>
<td>38</td>
<td>38</td>
<td>38</td>
<td>38</td>
</tr>
<tr>
<td>Rated frequency (Hz)</td>
<td>60</td>
<td>60</td>
<td>60</td>
<td>60</td>
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<tr>
<td>Power frequency withstand voltage (kV)</td>
<td>80</td>
<td>80</td>
<td>80</td>
<td>80</td>
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<tr>
<td>- across disconnector</td>
<td>95</td>
<td>110</td>
<td>95</td>
<td>110</td>
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<tr>
<td>Lightning impulse withstand voltage (kV)</td>
<td>150</td>
<td>170</td>
<td>170</td>
<td>170</td>
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<tr>
<td>- across disconnector</td>
<td>210</td>
<td>215</td>
<td>210</td>
<td>215</td>
</tr>
<tr>
<td>Rated normal current (A)</td>
<td>600</td>
<td>600</td>
<td>630</td>
<td>630</td>
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<tr>
<td>Short-circuit breaking current (kA)</td>
<td>20</td>
<td>20</td>
<td>25</td>
<td>25</td>
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<tr>
<td>Rated peak current (kA)</td>
<td>65</td>
<td>52</td>
<td>65</td>
<td>65</td>
</tr>
<tr>
<td>Making capacity (kA)</td>
<td>65</td>
<td>62.5</td>
<td>65</td>
<td>62.5</td>
</tr>
<tr>
<td>Short time current 1 sec. (kA)</td>
<td>25</td>
<td>20</td>
<td>25</td>
<td>25</td>
</tr>
<tr>
<td>Short time current 2 sec. (kA)</td>
<td>20</td>
<td>20</td>
<td>20</td>
<td>20</td>
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<tr>
<td>Short time current 3 sec. (kA)</td>
<td>20</td>
<td>20</td>
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</tbody>
</table>

### Internal arc classification
According to IEC 62271-200

- AFL Backwards (kA/s) 20/1 25/1 20/1 25/1 20/1 25/1 20/1 25/1
- AFLR Upwards (kA/s) 20/1 25/1 20/1 25/1 20/1 25/1 20/1 25/1
- AFLR Downwards (kA/s) 20/1 20/1 20/1 20/1 20/1 20/1 20/1 20/1

### Classes
ANSI/IEEE E1, M0, C2, M1, E2, M0, E2, C2, M1, S1
IEC 62271-1, 62271-100, 62271-102, 62271-103, 62271-105
ANSI/IEEE C37.58, C37.54

### Standard
ANSI/IEEE C37.20.3, C37.58, C37.54
IEC 62271-1, 62271-100, 62271-102, 62271-103, 62271-105, 62271-200, 60529

### Available modules:
ANSI/IEEE/IEC

### Unit Dimension A

<table>
<thead>
<tr>
<th>Unit</th>
<th>Dimension A</th>
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</thead>
<tbody>
<tr>
<td>1-module</td>
<td>16.5 inches / 490 mm</td>
</tr>
<tr>
<td>2-module</td>
<td>35.8 inches / 910 mm</td>
</tr>
<tr>
<td>3-module</td>
<td>52.4 inches / 1330 mm</td>
</tr>
<tr>
<td>4-module</td>
<td>68.9 inches / 1750 mm</td>
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</tbody>
</table>

### Module type Dimension B

<table>
<thead>
<tr>
<th>Module type</th>
<th>Dimension B</th>
</tr>
</thead>
<tbody>
<tr>
<td>F- and V-module</td>
<td>24.2 inches / 615 mm</td>
</tr>
<tr>
<td>C-, D-, Dc- and De-module</td>
<td>40.7 inches / 1035 mm</td>
</tr>
</tbody>
</table>

### Available symbols:

- C: Cable switch
- V: Vacuum circuit-breaker
- Dc: Air insulated direct cable connection (side connection only)
- De: Direct cable connection with earthing switch
- D: Direct cable connection
- F: Switch-fuse disconnector

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switchgear

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