

### Product type designation

### Antenna RF642A

SIMATIC RF600 ANTENNA RF642A LINEAR (BROAD BAND)

FREQUENCY RANGE 865 TO 928 MHZ DIMENSIONS

185X185X45 MM (LXWXH); IP 65, -25 TO +55 DEGREES/C;



|                                                |                  |
|------------------------------------------------|------------------|
| Suitability for operation                      | SIMATIC RF600    |
| <b>Wireless frequencies</b>                    |                  |
| Transmission frequency                         | 865 ... 928 MHz  |
| <b>Electrical data</b>                         |                  |
| Impedance                                      | 50 $\Omega$      |
| Polarization                                   | Linear           |
| Antenna gain compared to spherical radiator    |                  |
| • with linear radiation                        | 6 dB             |
| Standing wave ratio (VSWR) / maximum           | 1.5              |
| Radiating angle of the antenna                 |                  |
| • horizontal                                   | 75°              |
| • vertical                                     | 70°              |
| Type of electrical connection / of the antenna | RP-TNC           |
| Design of plug-in connection                   | male             |
| <b>Mechanical data</b>                         |                  |
| Material                                       | PA 12            |
| Color                                          | Pastel turquoise |

|                                                                                                                        |       |
|------------------------------------------------------------------------------------------------------------------------|-------|
| Tightening torque / of the screw for securing the equipment / maximum                                                  | 2 N·m |
| Mounting distance <ul style="list-style-type: none"> <li>relating to metal surfaces / recommended / minimum</li> </ul> | 0 m   |

#### Permitted ambient conditions

|                                                                                                                                          |                                                    |
|------------------------------------------------------------------------------------------------------------------------------------------|----------------------------------------------------|
| Ambient temperature <ul style="list-style-type: none"> <li>during operation</li> <li>during storage</li> <li>during transport</li> </ul> | -25 ... +75 °C<br>-40 ... +85 °C<br>-40 ... +85 °C |
| Protection class IP                                                                                                                      | IP65                                               |
| Shock resistance                                                                                                                         | according to EN 60068-2-27                         |
| Shock acceleration                                                                                                                       | 300 m/s <sup>2</sup>                               |
| Vibrational acceleration                                                                                                                 | 100 m/s <sup>2</sup>                               |

#### Design, dimensions and weight

|                                |                                                                                                    |
|--------------------------------|----------------------------------------------------------------------------------------------------|
| Width                          | 185 mm                                                                                             |
| Height                         | 185 mm                                                                                             |
| Depth                          | 45 mm                                                                                              |
| Net weight                     | 600 g                                                                                              |
| Mounting type                  | 4 screws M4 according to VESA 100, optional with articulated bracket by using antenna mounting kit |
| Wire length / of antenna cable | 0 m                                                                                                |

#### Product properties, functions, components / general

|                                |     |
|--------------------------------|-----|
| Product feature / silicon-free | Yes |
|--------------------------------|-----|

#### Standards, specifications, approvals

|                            |                                                             |
|----------------------------|-------------------------------------------------------------|
| Certificate of suitability | CE (according to R&TTE), FCC (Title 47, Part 15.247), cULus |
|----------------------------|-------------------------------------------------------------|

#### Accessories

|             |                          |
|-------------|--------------------------|
| accessories | Antenna cables 1 to 40 m |
|-------------|--------------------------|

#### Further Information / Internet Links

|                                                                                                                                                                                                                                                                                                                                                                                  |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         |
|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Internet-Link <ul style="list-style-type: none"> <li>to website: Selector SIMATIC NET SELECTION TOOL</li> <li>to website: Industrial communication</li> <li>to website: Industry Mall</li> <li>to website: Information and Download Center</li> <li>to website: Image database</li> <li>to website: CAx Download Manager</li> <li>to website: Industry Online Support</li> </ul> | <a href="https://support.industry.siemens.com/cs/ww/en/view/67384997">https://support.industry.siemens.com/cs/ww/en/view/67384997</a><br><br><a href="http://www.siemens.com/ident/rfid">http://www.siemens.com/ident/rfid</a><br><a href="https://mall.industry.siemens.com">https://mall.industry.siemens.com</a><br><a href="http://www.siemens.com/industry/infocenter">http://www.siemens.com/industry/infocenter</a><br><a href="http://automation.siemens.com/bilddb">http://automation.siemens.com/bilddb</a><br><a href="http://www.siemens.com/cax">http://www.siemens.com/cax</a><br><a href="https://support.industry.siemens.com">https://support.industry.siemens.com</a> |
|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|

**last modified:** 11/25/2016