# Disclaimer. This documentation is not intended as a substitute for and is not to be used for determining suitability or reliability of these products for specific user applications

# passive connection sub-base ABE7 - 16 inputs or outputs - Led



ABE7H16C21

### Main

| Range Of Product               | Modicon ABE7   |
|--------------------------------|--|
| Product Or Component Type      | Passive discrete I/O sub-base  |
| Sub-Base Type                  | Miniature sub-base   |
| [Us] Rated Supply Voltage      | 1930 V conforming to IEC 61131-2   |
| Number Of Channels             | 16   |
| Number Of Terminal Per Channel | 2  |
| Connections - Terminals        | Screw type terminals, 1 x 0.091 x 1.5 mm², 0.091.5 mm² (AWG 28AWG 16) flexible with cable end  Screw type terminals, 1 x 0.141 x 2.5 mm², 0.142.5 mm² (AWG 26AWG 12) |
|                                | solid Screw type terminals, 1 x 0.141 x 2.5 mm², 0.142.5 mm² (AWG 26AWG 14) flexible without cable end   |
|                                | Screw type terminals, 2 x 0.092 x 0.75 mm², 0.090.75 mm² (AWG 28AWG 20) flexible with cable end  |
|                                | Screw type terminals, 2 x 0.22 x 2.5 mm², 0.22.5 mm² (AWG 24AWG 14) solid  |

# Complementary

| Supply Voltage Type               | DC  |
|-----------------------------------|---|
| Number Of Horizontal Rows         | 2   |
| Status Led                        | 1 LED per channel (green) channel status<br>1 LED (green) power ON            |
| Polarity Distribution             | 0 V or 24 V   |
| Short-Circuit Protection          | 2 A internal fuse, 5 x 20 mm, fast blow (PLC end)                             |
| Fixing Mode                       | By clips (35 mm symmetrical DIN rail) By screws (solid plate with fixing kit) |
| Maximum Supply Current            | 1.8 A   |
| Current Per Channel               | 0.5 A   |
| Maximum Current Per Output Common | 1.8 A   |
| Voltage Drop On Power Supply Fuse | 0.3 V   |
| [Ui] Rated Insulation Voltage     | 2000 V  |
| Installation Category             | II conforming to IEC 60664-1  |
| Tightening Torque                 | 0.6 N.m with flat Ø 3.5 mm screwdriver  |
| Net Weight                        | 0.205 kg  |

### **Environment**

| <b>Product Certifications</b>            | GL<br>DNV  |
|--|--|
|  | CSA<br>UL<br>EAC   |
| Ip Degree Of Protection                  | IP2X conforming to IEC 60529   |
| Resistance To Incandescent Wire          | 750 °C, extinction time <30 s conforming to IEC 60695-2-11   |
| Shock Resistance                         | 15 gn for 11 ms conforming to IEC 60068-2-27   |
| Vibration Resistance                     | 2 gn (f= 10150 Hz) conforming to IEC 60068-2-6   |
| Resistance To Electrostatic<br>Discharge | 4 kV (contact) level 3 conforming to IEC 61000-4-2<br>8 kV (air) level 3 conforming to IEC 61000-4-2 |
| Resistance To Radiated Fields            | 10 V/m (260000001000000000 Hz) conforming to IEC 61000-4-3 level 3                                   |
| Resistance To Fast Transients            | 2 kV level 3 conforming to IEC 61000-4-4   |
| Ambient Air Temperature For Operation    | -560 °C conforming to IEC 61131-2  |
| Ambient Air Temperature For Storage      | -4080 °C conforming to IEC 61131-2   |
| Pollution Degree                         | 2 conforming to IEC 60664-1  |

# **Packing Units**

| Unit Type Of Package 1       | PCE      |
|------------------------------|----------|
| Number Of Units In Package 1 | 1        |
| Package 1 Height             | 7 cm     |
| Package 1 Width              | 8.3 cm   |
| Package 1 Length             | 13.6 cm  |
| Package 1 Weight             | 191 g    |
| Unit Type Of Package 2       | S03      |
| Number Of Units In Package 2 | 32       |
| Package 2 Height             | 30 cm    |
| Package 2 Width              | 30 cm    |
| Package 2 Length             | 40 cm    |
| Package 2 Weight             | 6.597 kg |

# **Contractual warranty**

Warranty 18 months

### Sustainability

**Green Premium<sup>TM</sup> label** is Schneider Electric's commitment to delivering products with best-inclass environmental performance. Green Premium promises compliance with the latest regulations, transparency on environmental impacts, as well as circular and low-CO<sub>2</sub> products.

**Guide to assessing product sustainability** is a white paper that clarifies global eco-label standards and how to interpret environmental declarations.

Learn more about Green Premium >

Guide to assess a product's sustainability >





Transparency RoHS/REACh

### Well-being performance



Mercury Free



Rohs Exemption Information

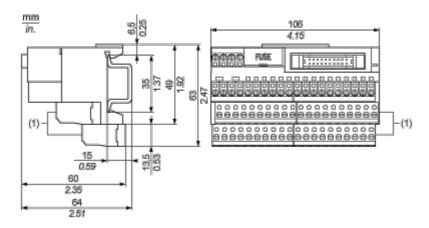
Yes

### **Certifications & Standards**

| Reach Regulation          | REACh Declaration   |
|---------------------------|---|
| Eu Rohs Directive         | Pro-active compliance (Product out of EU RoHS legal scope)  |
| China Rohs Regulation     | China RoHS declaration  |
| Environmental Disclosure  | Product Environmental Profile   |
| Weee                      | The product must be disposed on European Union markets following specific waste collection and never end up in rubbish bins   |
| Circularity Profile       | End of Life Information   |
| 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 www.P65Warnings.ca.gov |

### **Dimensions Drawings**

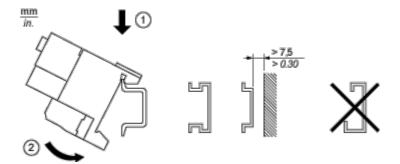
### **Dimensions**



(1) ABE7BV10 / BV20

Mounting and Clearance

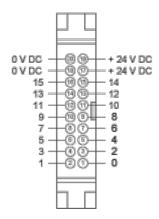
### Mounting



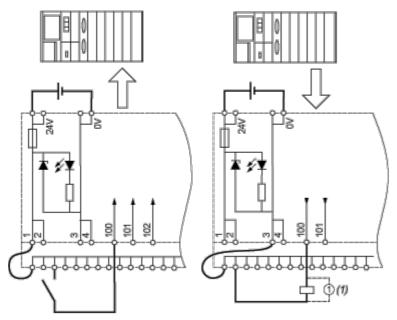
### **ABE7H16C21**

Connections and Schema

### HE10 16 Channels



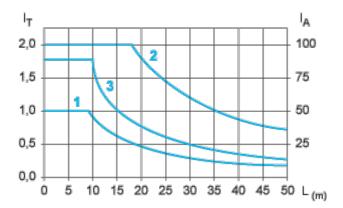
### Wiring Diagram



### Performance Curves

### **Curves for Determining Cable Type and Length According to the Current**

### 16-channel Sub-base



- L Cable length
- $I_{\mathsf{T}}$  Total current per sub base (A)
- I<sub>A</sub> Average current per channel (mA)
- (1) TSXCDP••2 and ABFH20H••0 cables with c.s.a. 0.08 mm<sup>2</sup> (AWG 28).
- (2) TSXCDP••3 cables with c.s.a. 0.34 mm<sup>2</sup> (AWG 22).
- (3) Cables with c.s.a. 0.13 mm<sup>2</sup> (AWG 26).

The curves are given for a voltage drop of 1 V in the cable. For n volts tolerance, multiply the length determined from the graph by n.