Standard display formats: 1, 2, 3, 4 or 8 variables some with bargraphs.

BA684DF-F

FOUNDATION™ fieldbus Fieldbus display 8 variables

General purpose

◆ **FOUNDATION™ fieldbus protocol, ITK 6.3 compliant.**

◆ **Compatible with most system hosts.**

◆ **High contrast display with backlight.**

◆ **Six optional local alarm outputs.**

◆ **IP66 field mounting GRP enclosure.**

◆ **3 year guarantee**

www.beka.co.uk/ba684df-f

The BA684DF-F Fieldbus Display is a general purpose instrument that can display up to eight fieldbus process variables. Eleven selectable standard screen formats contain one, two, three, four or eight variables, with units of measurement, tag descriptions and bargraphs on some screens.

Selectable function blocks allow the BA684DF-F fieldbus display to be used with all common system hosts. Configuration files may be downloaded from the Foundation fieldbus or the BEKA websites

Powered by the fieldbus the BA684DF-F only requires a 2-wire connection, no additional power supply is required. The high contrast 86 x 45mm liquid crystal display incorporates a green backlight enabling the display to be read in all lighting conditions from full sunlight to total darkness.

Simple commissioning results from the use of standard display formats. Apart from loading the BA684DF-F configuration files onto the system host and selecting the fieldbus variables to be displayed, no programming is required. Configuration of the BA684DF-F Fieldbus Display is performed via the fieldbus and

the instrument front panel push buttons; simple menus enable the required standard display format to be selected and the units of measurement and tag information for each variable to be entered.

Six optional local alarm outputs may be linked to any of the displayed variables. Each isolated single pole solid state output may be conditioned as a combined high and low alarm, or as just a high or low alarm. Each output can switch any low power load such as a sounder, lamp or solenoid valve. Alarm configuration and the alarm set point adjustment is performed via the BA684DF-F front panel push buttons, as the local alarms are not accessible from the fieldbus system host.

Comprehensive documentation includes a FOUNDATION™ fieldbus Interface Guide.

For panel mounting applications see the BA688CF-F datasheet. This instrument has a similar electrical specification but is housed in a 144 x 72 panel mounting enclosure.

If flammable atmospheres are present the intrinsically safe BA484DF-F fieldbus display should be used.

SPECIFICATION

Display

Type	120 x 64 pixel liquid crystal
Size	86.5mm x 45mm
Backlight	Powered from fieldbus
Screens	
Standard format	1, 2, 3, 4 or 8 variables plus bargraph can include:
	units of measurement
	tag information

Controls

Front panel	Four push buttons scroll the indicator display between screens when the BA684DF-F is configured to display more variables than fit onto a single screen. Also used to configure optional local alarms.

Fieldbus communication

Voltage	9 to 32V
Current	25mA
Compliant with	IEC61158-2 31.25kbits/s Voltage Mode.
Protocol	FOUNDATION™ fieldbus, ITK 6.3 compliant
Function blocks	
FOUNDATION™ fieldbus	1 x MAO (Multiple Analogue Output)
or	2 x IS (Input Selector)

Selectable on-site

Environmental

Operating temp	-20 to 60°C
Storage temp	-40 to 85°C
Humidity	To 95% @ 40°C
Enclosure	IP66
EMC	In accordance with EU Directive 2014/30/EU

Mechanical

Terminals	Screw clamp for 0.5 to 1.5mm^2 cable.
Weight	1.6kg

Accessories

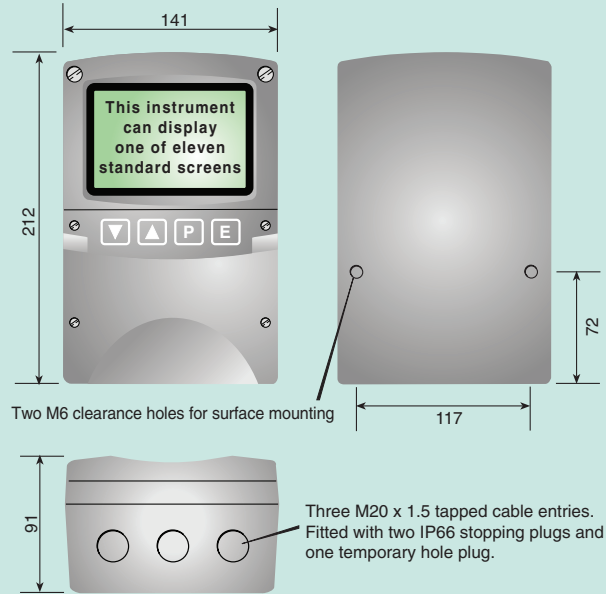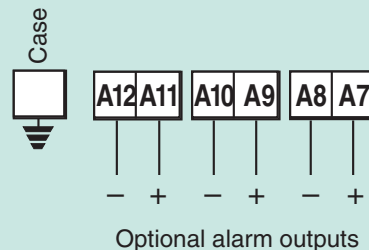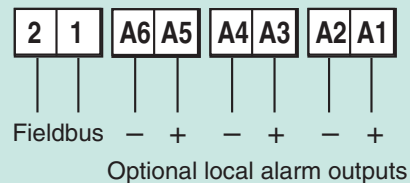|	
Alarms	Six galvanically isolated outputs which may be linked to displayed variables. Each alarm is configurable from instrument push buttons as: combined high and low alarm high or low alarm *Note: Alarms are not accessible from the fieldbus system host*
Contacts	Isolated single pole solid state Ron less than 5Ω + 0.7V Roff greater than 1MΩ Vmax= 30V dc Imax = 200mA
Tag strip	Printed legend behind the display window
Tag plate	Engraved stainless steel plate attached to the side of the instrument.
Pipe mounting kit	BA392D or BA393
Interface guide	May be downloaded from www.beka.co.uk

DIMENSIONS (mm)

141
212
This instrument can display one of eleven standard screens
▽ △ P E
72
117
Two M6 clearance holes for surface mounting
91
Three M20 x 1.5 tapped cable entries. Fitted with two IP66 stopping plugs and one temporary hole plug.

TERMINAL CONNECTIONS

2	1	A6	A5	A4	A3	A2	A1

Fieldbus   −   +   −   +   −   +

Optional local alarm outputs

Case

A12	A11	A10	A9	A8	A7

−   +   −   +   −   +

Optional alarm outputs

HOW TO ORDER

	Please specify
Model number	BA684DF-F

Accessories	**Please specify if required**
Six alarms	Alarms
Tag strip	Tag strip legend
Tag plate	Tag plate legend
Pipe mounting kit	BA392D or BA393

Will be set to display 00.0 at 4mA and 100.0 at 20mA if calibration information is not supplied.