File E52653 Project 4787321702

May 23, 2016

REPORT

on

COMPONENT - CONNECTORS FOR USE IN DATA, SIGNAL, CONTROL AND POWER APPLICATIONS

Hirose Electric Co Ltd KANAWAGAWA 224-0540 JAPAN

Copyright © 2016 UL LLC

UL LLC authorizes the above named company to reproduce this Report only for purposes as described in the Conclusion. The Report should be reproduced in its entirety; however to protect confidential product information, the Construction Details Descriptive pages may be excluded.

File E52653 Vol. 11 Sec. 32 Page 1 Issued: 2016-05-23 and Report

DESCRIPTION

PRODUCT COVERED:

USR, CNR Component Connector, Series DF3E:

Cat. Nos. DF3E, may be followed by A, followed by -2P thru -15P, followed by -2V or -2H, may be followed by (01) thru (99).

GENERAL:

These devices are multi-pole connectors intended for factory assembly on printed wiring boards where the acceptability of combinations is determined by UL LLC. The devices are identified as follows:

USR indicates investigation to United States Standards, UL 1977.

CNR indicates investigation to Canadian National Standards, C22.2 No. 182.3.

RATINGS:

	Electrical Ratings		
Series	Voltage, Vac	Ampere, A	
DF3E	30	3	

Disconnecting Use - see Sec Gen for required marking

File E52653 Vol. 11 Sec. 32 Page 2 Issued: 2016-05-23 and Report

NOMENCLATURE: Series DF3E are designated as follows:

Example: DF3E A -2 P -2 V (01) I II III IV V VI VII

I: - Series name = DF3E

III: - Number of Poles : 2 poles thru 15 poles

IV: - Connector type : P = Pin header

V: - Contact pitch : 2 = 2 mm

VI: - Contact shape : V = Vertical to surface mount H = Horizontal to surface mount

VII: - Customer specifications

(01) to (99) or blank where indicates packaging differences and plating variations.

:(50) to (59), (75) to (79) and (95) to (99) = employing gold plated brass for contacts and pins

: Other than the above = employing tin plated brass for contacts and $\ensuremath{\mathsf{pins}}$

File E52653 Vol. 11 Sec. 32 Page 3 Issued: 2016-05-23 and Report

TECHNICAL CONSIDERATIONS (NOT FOR FIELD REPRESENTATIVE'S USE):

Use - For use only in or with complete equipment where the acceptability of the combination is determined by UL LLC.

Conditions of Acceptability - The following are among the considerations to be made when evaluating the device in the end-use product.

Interruption of Current

1. These devices are not suitable for interrupting the flow of current by connecting or disconnecting the mating connector.

Current-Carrying Capability and Current Ratings

2. These devices have been subjected to the Temperature test with the rated currents and maximum temperature rise and recorded temperature (adjusted to $25\,^{\circ}\text{C}$ ambient) values tabulated below:

Cat. No.	Wire Size (AWG)	Current, A	Maximum Temperature °C		Represent
			Rise	Recorded Temperature	device
DF3EA-15P-2V (mating with DF3-15S-2C employing all contacts, type DF3-2428SC, with 24 AWG)	-	3	25.4	50.4	Series DF3E (mating with Series DF3)
DF3EA-15P-2H (mating with DF3-15S-2C employing all contacts, type DF3-2428SC, with 24 AWG)	-	3	26.8	51.8	

Note: Mating devices - R/C (ECBT2), E52653, Vol. 11 / Sec. 4, issued 1991-12-27