

Oct.1.2018 Copyright 2018 HIROSE ELECTRIC CO., LTD. All Rights Reserved.
In case that the application demands a high level of reliability, such as automotive,
please contact a company representative for further information.

Applicable standard										
Rating	Operating temperature range	-35 °C to +85°C (Note1)		Storage temperature range	-10 °C to +60°C (Note3)					
	Operating humidity range	40% to 80% (Note2)		Storage humidity range	40% to 70% (Note3)					
	Applicable connector	DF5A-*DS-5C		Current (*2)	Number of contact	AWG 18	AWG 20	AWG 22		
	Voltage (*1)	500 V AC/DC				4,6	8 A	6 A	5 A	
	UL-CSA Rating	Voltage	See(*1)			8,10	7 A	6 A	5 A	
Current		See(*2)				12	7 A	6 A	4 A	
				14,16	7 A	6 A	4 A			
Specifications										
Item		Test method			Requirements			QT	AT	
Construction										
General examination		Visually and by measuring instrument.			According to drawing.			X	X	
Marking		Confirmed visually.						X	X	
Electric characteristics										
Contact resistance Millivolt level method		100mA (DC or 1000Hz).			30 mΩ MAX.			X	-	
Insulation resistance		500 V DC.			1000 MΩ MIN.			X	-	
Voltage proof		1500 V AC for 1 min.			No flashover or breakdown.			X	-	
Mechanical characteristics										
Mechanical operation		30 times insertion and extraction.			①Contact resistance: 30 mΩ MAX. ②No damage, crack or looseness of parts.			X	-	
Vibration		Frequency 10 to 55Hz, single amplitude 0.75 mm, at 2h, for 3 directions.			①No electrical discontinuity of 10 μ s. ②No damage, crack or looseness of parts.			X	-	
Shock		490 m/s ² duration of pulse 11 ms at 3 times for 3 directions.						X	-	
Environmental characteristics										
Damp heat (Steady state)		Exposed at 40 ± 2°C , 90 to 95 %, 96 h. (After leaving the room temperature for 1-2h.)			①Contact resistance: 30 mΩ MAX. ②Insulation resistance: 500 MΩ MIN. ③No damage, crack or looseness of parts.			X	-	
Rapid change of temperature		Temperature -55 →5 to 35→ 85 →5 to 35 °c Time 30 → 5 → 30 → 5 min Under 5 cycles.			①Contact resistance: 30 mΩ MAX. ②Insulation resistance: 1000 MΩ MIN. ③No damage, crack or looseness of parts.			X	-	
Resistance to soldering heat		[Recommended temperature profile] Solder temperature 260±3°C for immersing duration 10±1s. [Recommended manual soldering condition] Soldering iron temperature:350±5°C for within 3±1s No strength on contact.			No deformation on case or excessive looseness of the terminals.			X	-	
Solderability		Soldered at solder temperature : 235°C For in immersing duration : 5s.			New uniform coating of solder shall cover minimum of 95 % of the surface being immersed.			X	-	
Remarks										
Note 1:Including the temperature rising by current.										
Note 2:No condensing										
Note 3:Apply to the condition of long term storage for unused products before pcb on board, after pcb on board, operating temperature and humidity range is applied for interim storage during transportation.										
	Count	Description of revisions			Designed		Checked		Date	
Unless otherwise specified, refer to IEC 60512.					Approved	KI. AKIYAMA		15. 11. 05		
					Checked	TS. FUKUSHIMA		15. 11. 05		
					Designed	HT. SATO		15. 11. 04		
					Drawn	MI. SAKIMURA		15. 11. 02		
Note QT:Qualification Test AT:Assurance Test X:Applicable Test					Drawing no.		ELC-302829-35-00			
	Specification sheet				Part no.	DF5A-*DP-5DSA (35)				
	Hirose electric co., ltd.				Code no.	CL676-			1/1	