

Applicable standard							
Rating	Operating temperature range	-55 °C to +105°C (Note1)		Storage temperature range	-10 °C to +60°C (Note3)		
	Operating humidity range	20% to 80% (Note2)		Storage humidity range	40% to 70% (Note3)		
	Applicable Connector	1)DF63(A)-*EP-3.96C(##) 2)DF63WA-*EP-3.96C(##)		Voltage	AC/DC 630V		
	Applicable cable	AWG#20 to 22		Current	Applicable connector	1)	2)
	Insulation diameter	φ 1.5 to 1.9 mm			AWG 20	11A	9A
					AWG 22	9A	8A
		Rated Voltage	Rated Current	Overvoltage Category		IP-Degree	
UL,C-UL		600V AC/DC	See above	-		-	
TÜV		300V AC/DC	See above	II		IP00	
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	20mV MAX, 1ma (DC or 1000Hz).			10 mΩ MAX.		X	—
Mechanical characteristics							
Mechanical operation	30 times insertion and extraction.			①Contact resistance: 20 mΩ MAX. ②No damage, crack or looseness of parts.		X	—
Vibration	Frequency 10 to 55 Hz, single amplitude 0.75 mm, at 10 cycles for 3 direction.			①No electrical discontinuity of 1 μ s. ②No damage, crack or looseness of parts.		X	—
Shock	490 m/s ² duration of pulse 11 ms at 3 times each for 3 both axial 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 to 2h.)			①Contact resistance: 20 mΩ MAX. ②No damage, crack or looseness of parts.		X	—
Rapid change of temperature	Temperature -55°C→ +85°C Time 30min→ 30min Under 5 cycles. (the transferring time of the tank is 2 to 3 min) (after leaving the room temperature for 1 to 2h.)					X	—
<p>Note 1: Include the temperature rising by current.</p> <p>Note 2: No condensing. </p> <p>Note 3: Apply to the condition of long term storage for unused products before harness assembly. After harness assembly, operation temperature and humidity range is applied for interim storage during transportation.</p>							
	Count	Description of revisions	Designed	Checked	Date		
	6	DIS-H-00005510	HT. SATO	SZ. ONO	20191126		
Remarks Unless otherwise specified, refer to IEC 60512.				Approved	HS. OKAWA	20170411	
				Checked	TS. FUKUSHIMA	20170411	
				Designed	YK. YAMAGUCHI	20170411	
				Drawn	YK. YAMAGUCHI	20170411	
Note QT:Qualification Test AT:Assurance Test X:Applicable Test			Drawing No.		ELC-362152-00-00		
	Specification sheet		Part No.	DF63-2022PC			
	HIROSE ELECTRIC CO., LTD.		Code No.	CL680-0539-6-00			1/1