




APPLICABLE STANDARD		TÜV approved(R50204909), UL approved(E52653)			
Rating	Operating Temperature Range	-40°C to +125°C <sup>(4)</sup>	Storage Temperature Range	-10°C to +60°C	
	Voltage	AC, DC 500 V(UL,TÜV) AC, DC 1000V	—	—	
	Current	30A(EM-PC-113(**))	Applicable Cable	—	
		50A(EM-PC-133(**)) (EM-PC-143(**) UL,TÜV)			
70A(EM-PC-143(**))					
SPECIFICATIONS					
ITEM		TEST METHOD	REQUIREMENTS	QT	AT
CONSTRUCTION					
General Examination		Examined visually and with a measuring instrument.	According to the drawing.	X	X
Marking		Confirmed visually.		X	X
ELECTRICAL CHARACTERISTICS					
Contact Resistance		Measured at DC 1A.	1 mΩ MAX.	—	—
Insulation Resistance		Measured at 500 V DC.	5000 MΩ MIN.	X	X
Voltage Proof		4260 V AC applied for 1 min.	No flashover or breakdown.	X	X
MECHANICAL CHARACTERISTICS					
Contact Insertion and Extraction Forces		Measured with a ϕ___ steel gauge.	Insertion and extraction forces: — N MIN.	—	—
Mating and Unmating Forces		Measured with an applicable connector	Mating and unmating forces: 100 N MAX.	X	—
Contact Retention Force		Subjected to a 50N force from the wiring side.	No movement of contact.	X	—
Mechanical Operation		Mated and unmated 100 times.	No damage, cracks or looseness of parts.	X	—
Vibration		Frequency: 10 Hz to 55 to 10 Hz every cycle. Single amplitude: 0.75 mm, Acceleration: 98 m/s <sup>2</sup> Performed over 10 cycles in each of three mutually perpendicular directions.	1) No electrical discontinuity of more than 10 μs. 2) No damage, cracks or looseness of parts.	X	—
Shock		Acceleration: 490 m/s <sup>2</sup> , Half sine wave pulses of 11 ms. Performed 3 times in each of three mutually perpendicular directions.	1) No electrical discontinuity of more than 10 μs. 2) No damage, cracks or looseness of parts.	X	—
ENVIRONMENTAL CHARACTERISTICS					
Rapid Change of Temperature		Temperature: -55 → R/T <sup>(1)</sup> → +125 → R/T °C Time: 30 → 2 to 3 → 30 → 2 to 3 min for 5 cycles.	1) Insulation resistance: 500 MΩ MIN. 2) No damage, cracks or looseness of parts.	X	—
Damp Heat, Steady State		Subjected to a temperature of+40°C, at a humidity of 90 to 95% for 96 hours.	1) Insulation resistance: 50 MΩ MIN. (At high humidity) 2) Insulation resistance: 500 MΩ MIN. (When dry) 3) No damage, cracks or looseness of parts.	X	—
	COUNT	DESCRIPTION OF REVISIONS	DESIGNED	CHECKED	DATE
					
<b>NOTES</b>  (1) R/T : Room Temperature. (2) The above specifications show the values in assembled condition with applicable crimp contacts.(EM-PC-1*3(**)) (3) RoHS compliant. (4) Including temperature rise due to current carrying.  Unless otherwise specified, refer to IEC 60512(JIS C 5402).			APPROVED	TP. KOMATSU	20201222
			CHECKED	TP. KOMATSU	20201222
			DESIGNED	TY. SUZUKI	20201222
			DRAWN	TY. SUZUKI	20201222
Note QT:Qualification Test AT:Assurance Test X:Applicable Test			DRAWING NO.		ELC-117594-81-00
	SPECIFICATION SHEET		PART NO.	EM35MRA-4PC (81)	
	HIROSE ELECTRIC CO., LTD.		CODE NO.	CL0138-0028-0-81	 1/1