

APPLICABLE STANDARD				
RATING	OPERATING TEMPERATURE RANGE	-55 °C TO 85 °C ⁽¹⁾⁽²⁾	STORAGE TEMPERATURE RANGE	-10 °C TO 60 °C ⁽³⁾
	OPERATING HUMIDITY RANGE	RH 85 % MAX ⁽²⁾⁽⁴⁾	STORAGE HUMIDITY RANGE	RH 70 % MAX ⁽³⁾⁽⁴⁾
	VOLTAGE	60 V AC	CURRENT	0.5 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	20 mV MAX, 1 mA(DC OR 1000Hz)	80 mΩ MAX. ⁽⁵⁾	x	
INSULATION RESISTANCE	100 V DC.	500 MΩ MIN.	x	
VOLTAGE PROOF	200 V AC FOR 1 min.	NO FLASHOVER OR BREAKDOWN.	x	
MECHANICAL CHARACTERISTICS				
INSERTION AND WITHDRAWAL FORCES	MEASURED BY APPLICABLE CONNECTOR.	INSERTION FORCE: 20.5 N MAX. WITHDRAWAL FORCE: 2.05 N MIN.	x	
MECHANICAL OPERATION	50 TIMES INSERTIONS AND EXTRACTIONS.	① CONTACT RESISTANCE: NO VARIATION OF 20 mΩ OR MORE FROM INITIAL VALUE. ② NO DAMAGE, CRACK AND LOOSENESS OF PARTS.	x	
VIBRATION	FREQUENCY 10 TO 55 Hz, SINGL AMPLITUDE : 0.75 mm, FOR 2 h IN 3 DIRECTIONS.	① NO ELECTRICAL DISCONTINUITY OF 1 μs. ② NO DAMAGE, CRACK AND LOOSENESS OF PARTS.	x	
SHOCK	490 m/s ² , DURATION OF PULSE 11 ms FOR 3 TIMES IN 3 DIRECTIONS.		x	
ENVIRONMENTAL CHARACTERISTICS				
DAMP HEAT (STEADY STATE)	EXPOSED AT 40±2 °C, 90 ~ 95 %, 96 h.	① CONTACT RESISTANCE: NO VARIATION OF 20 mΩ OR MORE FROM INITIAL VALUE. ② INSULATION RESISTANCE: 500 MΩ MIN. ③ NO DAMAGE, CRACK AND LOOSENESS OF PARTS.	x	
DRY HEAT	EXPOSED AT 85±2 °C, 96 h		x	
RAPID CHANGE OF TEMPERATURE	TEMPERATURE -55 → +5~+35 → +85 → +5~+35 °C TIME 30 → 5 MAX → 30 → 5 MAX min. UNDER 5 CYCLES.	① CONTACT RESISTANCE: NO VARIATION OF 20 mΩ OR MORE FROM INITIAL VALUE. ② NO DERECT SUCH AS CORROSION WHICH IMPAIRS THE FUNCTION OF CONNECTOR.	x	
CORROSION SALT MIST	EXPOSED IN 5 % SALT WATER SPRAY FOR 48 h.		x	
SULFUR DIOXIDE	EXPOSED IN 25 PPM FOR 96 h. (TEST STANDARD: JIS C 60068)		x	
AMMONIA RESISTANCE	HYDROGEN-ION CONCENTRATION(pH)=10 TEST TIME:72±4h TEMPERATURE:15~35°C.	CONTACT RESISTANCE: NO VARIATION OF 20mΩ OR MORE FROM INITIAL VALUE.	x	
RESISTANCE TO SOLDERING HEAT	1)REFLOW SOLDERING : REFLOW 2 TIMES UNDER THE TEMPERATURE PROFILE SHOWN BELOW. 2) SOLDERING IRONS : 360°C MAX. FOR 5 sec.	NO DEFORMATION OF CASE OF EXCESSIVE LOOSENESS OF THE TERMINAL.	x	
SOLDERABILITY	SOLDERED AT SOLDER TEMPERATURE 240±3°C FOR IMMERSION DURATION, 3 sec.	A NEW UNIFORM COATING OF SOLDER SHALL COVER A MINIMUM OF 95 % OF THE SURFACE BEING IMMERSED.	x	
COUNT	DESCRIPTION OF REVISIONS	DESIGNED	CHECKED	DATE
△				
REMARKS		APPROVED	HS. OKAWA	10. 03. 09
⁽¹⁾ INCLUDE TEMPERATURE RISE CAUSED BY CURRENT-CARRYING. ⁽²⁾ OPERATING TEMPERATURE SHOULD BE -55 TO 40°C WHEN HUMIDITY EXCEEDS 80% RH. ⁽³⁾ "STORAGE" MEANS A LONG-TERM STORAGE STATE FOR THE UNUSED PRODUCT BEFORE ASSEMBLY TO PCB. ⁽⁴⁾ THERE MUST NOT BE DEWFALL. ⁽⁵⁾ DON'T INCLUDE THE CONDUCTOR RESISTANCE OF THE CABLE OF THE COMBINATION CONNECTOR.		CHECKED	HT. YAMAGUCHI	10. 03. 09
Unless otherwise specified, refer to JIS-C-5402.		DESIGNED	TP. MATSUMOTO	10. 03. 09
		DRAWN	TP. MATSUMOTO	10. 03. 09
Note	QT:Qualification Test AT:Assurance Test X:Applicable Test	DRAWING NO.	ELC4-330389-00	
HRS	SPECIFICATION SHEET	PART NO.	FX16M2-41S-0.5SV	
	HIROSE ELECTRIC CO., LTD.	CODE NO.	CL575-3002-6-00	△ 1/1