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 In case that the application demands a high level of reliability, such as automotive,  
 please contact a company representative for further information.

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COUNT	DESCRIPTION OF REVISIONS	BY	CHKD	DATE	COUNT	DESCRIPTION OF REVISIONS	BY	CHKD	DATE
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<b>APPLICABLE STANDARD</b>		OPERATING TEMPERATURE RANGE		-25 °C TO +85 °C	OPERATING TEMPERATURE RANGE		-25 °C TO +85 °C
RATING	VOLTAGE	AC 30 V , DC 42 V					
	CURRENT	2 A		APPLICABLE CABLE	φ6.2 TO φ7		

  

<b>SPECIFICATIONS</b>					
ITEM	TEST METHOD	REQUIREMENTS	QT	AT	

  

<b>CONSTRUCTION</b>					
GENERAL EXAMINATION	VISUALLY AND BY MEASURING INSTRUMENT.	ACCORDING TO DRAWING.	×	×	
MARKING	CONFIRMED VISUALLY.		×	×	

  

<b>ELECTRIC CHARACTERISTICS</b>					
CONTACT RESISTANCE	CONTACT SHALL BE MEASURED AT DC 1 A	15 mΩ MAX.	×	×	
	CONTACT SHALL BE MEASURED AT DC ___ A	___ mΩ MAX.	—	—	
INSULATION RESISTANCE	100 V DC.	1000 MΩ MIN.	×	×	
VOLTAGE PROOF	300 V AC FOR 1 min.	NO FLASHOVER OR BREAKDOWN.	×	×	

  

<b>MECHANICAL CHARACTERISTICS</b>					
CONNECTOR INSERTION AND WITHDRAWAL FORCES	MEASURED BY APPLICABLE CONNECTOR.	INSERTION AND WITHDRAWAL FORCES LOCKING DEVICE WITH LOCK : 50 N MAX.	×	—	
MECHANICAL OPERATION	1000 TIMES INSERTIONS AND EXTRACTIONS.	CONTACT RESISTANCE: 30 mΩ MAX. ___ RESISTANCE: ___ mΩ MAX.	×	—	
VIBRATION	FREQUENCY 10 TO 55 Hz (1CYC, 5min), SINGLE AMPLITUDE 0.75 mm, AT 10 CYC, FOR 3 DIRECTIONS.	①NO ELECTRICAL DISCONTINUITY OF 10 μs. ②NO DAMAGE, CRACK AND LOOSENESS, OF PARTS.	×	—	
SHOCK	IN OPPOSITE DIRECTIONS OF EACH 3 DEMENSION ALAXIS FOR 3 TIMES AT 490 m/s <sup>2</sup> DURATIONS OF PULSE 11 ms.	①NO ELECTRICAL DISCONTINUITY OF 10 μs. ②NO DAMAGE, CRACK AND LOOSENESS, OF PARTS.	×	—	
BREAKING STRENGTH	MAX 30N SHALL BE APPLIED TO CABLE IN UP AND DOWN, LEFT AND RIGHT DIRECTIONS WHEN MATED.	NO BREAKAGE MAX 30N.	×	—	

  

<b>ENVIRONMENTAL CHARACTERISTICS</b>					
DAMP HEAT (STEADY STATE)	EXPOSED AT 40 °C, 90 TO 95 %, 96 h.	①INSULATION RESISTANCE: 10 MΩ MIN (AT HIGH HUMIDITY). ②INSULATION RESISTANCE: 100 MΩ MIN (AT DRY). ③NO DAMAGE, CRACK AND LOOSENESS OF PARTS.	×	—	
RAPID CHANGE OF TEMPERATURE	TEMPERATURE -55 → R/T <sup>(1)</sup> → +85 → R/T °C TIME 30 → 10 TO 15 → 30 → 10 TO 15 min UNDER 5 CYCLES.	①INSULATION RESISTANCE: 100 MΩ MIN. ②NO DAMAGE, CRACK AND LOOSENESS OF PARTS.	×	—	
CORROSION SALT MIST	EXPOSED IN 5 % SALT WATER SPRAY FOR 48 h.	NO HEAVY CORROSION.	×	—	
DRY HEAT	EXPOSED AT +85 °C , 96 h.	NO DAMAGE, CRACK AND LOOSENESS OF PARTS.	×	—	
COLD	EXPOSED AT -55 °C , 96 h.	NO DAMAGE, CRACK AND LOOSENESS OF PARTS.	×	—	
RESISTANCE TO SOLDERING HEAT	SOLDER TEMPERATURE, +380±10°C ,FOR IMMERSION DURATION, 3 <sup>+1</sup> <sub>0</sub> s.	NO DEFORMATION OF CASE OF EXCESSIVE LOOSENESS OF THE TERMINALS.	×	—	
SOLDERABILITY	SOLDERED AT SOLDER TEMPERATURE, +350±10°C FOR IMMERSION DURATION, 2 TO 3 s.	SOLDER SURFACE TO BE FREE FROM PIN-HOLE, NO WETTING AND OTHER DEFECTS.	×	—	
SEALING	EXPOSED AT A DEPTH OF 1 m FOR 0.5 h.	NO WATER PENETRATION INSIDE CONNECTOR.	×	—	
AIRTIGHTNESS	APPLY AIR PRESSURE 17.6kPa FOR 0.5min TO INSIDE CONNECTOR.	NO AIR BUBBLES INSIDE CONNECTOR.	×	—	

  

<b>REMARKS</b>	DRAWN	DESIGNED	CHECKED	APPROVED	RELEASED
	<i>E. Kunita</i> 05.10.14	<i>E. Kunita</i> 05.10.14	/	<i>N. Sato</i> 05.10.17	

  

NOTE(1) R/T : ROOM TEMPERATURE  
 Unless otherwise specified, refer to JIS C 5402.

Note QT:Qualification Test AT:Assurance Test ×:Applicable Test

  

<b>HS</b> HIROSE ELECTRIC CO., LTD.	SPECIFICATION SHEET	PART NO. HR30-7J-12P (71)
CODE NO. (OLD) CL	DRAWING NO. ELC4-113842-71	CODE NO. CL130-2020-9-71

  

FORM No. 231-1

