

| APPLICABLE STANDARD   |   |  |                           |                        |
|---|---|--|---------------------------|------------------------|
| RATING  | OPERATING TEMPERATURE RANGE   | -40°C TO 85°C (NOTE 1)   | STORAGE TEMPERATURE RANGE | -10°C TO 60°C          |
|   | VOLTAGE   | 30V AC/DC  | APPLICABLE CONNECTOR      | BM24-20DP/2-0.35V (51) |
|   | CURRENT   | SIGNAL CONTACT: 0.25A<br>POWER CONTACT: 5.0A (NOTE 2)  |                           |                        |
| 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 AC OR LESS 1kHz,1m A .   | Signal contact resistance: 100 mΩ MAX.<br>Power contact resistance: 15 mΩ MAX.   | X                         | -                      |
| INSULATION RESISTANCE   | 100V DC.  | 100MΩ MIN.   | X                         | -                      |
| VOLTAGE PROOF   | 150V AC FOR 1 min.  | NO FLASHOVER OR BREAKDOWN.   | X                         | -                      |
| MECHANICAL CHARACTERISTICS  |   |  |                           |                        |
| MECHANICAL OPERATION  | 10TIMES INSERTIONS AND EXTRACTIONS.   | ① Signal contact resistance: 100 mΩ MAX.<br>Power contact resistance: 15 mΩ MAX.<br>② NO DAMAGE, CRACK OR LOOSENESS OF PARTS.  | X                         | -                      |
| VIBRATION   | FREQUENCY 10 TO 55 TO 10 Hz, APPROX 5min, SINGLE AMPLITUDE 0.75 mm, 10CYCLES, FOR 3 DIRECTIONS.                 | ① NO ELECTRICAL DISCONTINUITY OF 1 μs.<br>② NO DAMAGE, CRACK OR LOOSENESS OF PARTS.  | X                         | -                      |
| SHOCK   | 490 m/s <sup>2</sup> DURATION OF PULSE 11 ms AT 3 TIMES FOR 3 DIRECTIONS.                                       | ① NO ELECTRICAL DISCONTINUITY OF 1 μs.<br>② NO DAMAGE, CRACK OR LOOSENESS OF PARTS.  | X                         | -                      |
| ENVIRONMENTAL CHARACTERISTICS   |   |  |                           |                        |
| RAPID CHANGE OF TEMPERATURE   | TEMPERATURE -55 → +85°C<br>TIME 30 → 30 min<br>UNDER 5 CYCLES.<br>(RELOCATION TIME TO CHAMBER : WITHIN 2-3 min) | ① Signal contact resistance: 100 mΩ MAX.<br>Power contact resistance: 15 mΩ MAX.<br>② INSULATION RESISTANCE: 100MΩ MIN.<br>③ NO DAMAGE, CRACK OR LOOSENESS OF PARTS. | X                         | -                      |
| DAMP HEAT (STEADY STATE)  | EXPOSED AT 40 ± 2 °C, 90 TO 95 %, 96 h.   | ① Signal contact resistance: 100 mΩ MAX.<br>Power contact resistance: 15 mΩ MAX.<br>② INSULATION RESISTANCE: 50MΩ MIN.<br>③ NO DAMAGE, CRACK OR LOOSENESS OF PARTS.  | X                         | -                      |
| SULPHUR DIOXIDE   | EXPOSED IN 25 PPM FOR 96h, 25°C, 75%.<br>(REFER TO JIS C 60068)   | ① Signal contact resistance: 100 mΩ MAX.<br>Power contact resistance: 15 mΩ MAX.<br>② NO EVIDENCE OF CORROSION WHICH AFFECTS TO OPERATION OF CONNECTOR.              | X                         | -                      |
|   |   |  |                           |                        |
| COUNT   | DESCRIPTION OF REVISIONS  | DESIGNED   | CHECKED                   | DATE                   |
| △   |   |  |                           |                        |
| REMARKS   |   | APPROVED   | MO. ISHIDA                | 15.12.14               |
| NOTE1: INCLUDE THE TEMPERATURE RISING BY CURRENT  |   | CHECKED  | TS. MIYAZAKI              | 15.12.14               |
| NOTE2: RATED CURRENT FOR POWER CONTACTS IS 4A/PIN IN CASE MAX 0.3A/PIN IS APPLIED TO SIGNAL CONTACTS. |   | DESIGNED   | NY. YAMASHIRO             | 15.12.14               |
| Unless otherwise specified, refer to JIS C 5402 and IEC 60512.  |   | DRAWN  | KR. AJITO                 | 15.12.11               |
| Note  | QT:Qualification Test AT:Assurance Test X:Applicable Test   | DRAWING NO.  | ELC-352684-53-01          |                        |
| <b>HRS</b>  | SPECIFICATION SHEET   | PART NO.   | BM24-20DS/2-0.35V (53)    |                        |
|   | HIROSE ELECTRIC CO., LTD.   | CODE NO.   | CL677-2004-7-53           | △ 1/1                  |