

Slip ring TKF series



These slip rings are used for construction machinery and vehicles as well as for industrial machines.

They allow the conduction of many different kinds of electrical signals that support the needs of users.

As an option, sensors for detecting swivel angles can also be incorporated.

These slip rings have a proven results in construction machinery and vehicles, and feature an excellent resistance to environmental conditions.

Features

1. The slip rings are capable of many different kinds of electrical conduction, and they have a proven performance in the fields of direct current, alternating current and serial communication.

Maximum ratings:

- Direct current: DC 24 V/10 A
- Alternating current: AC 100 V/10 A
- Serial communication: RS-422/19.2 kbps communication system

(Direct current, alternating current and/or serial communication can be used together.)

2. Sensors for swivel angle detection can also be incorporated. Potentiometers and proximity switches may also be incorporated.

3. The slip rings have an excellent resistance to environmental conditions.

- Water-proof structure: JIS D 0203 S1
- Vibration resistance: JIS D 1601 Class 3B Grade 70
- Impact resistance: Impact acceleration of 245 m/sec² for 0.011 to 0.02 sec. 3 times in each of 3 directions (X, Y, Z)

4. A maximum of 32 poles can be supported.

Model Code

TKF-**-100-21

1 2 3 4

1 Series designation

2 No. of poles 02, 03, 04, 06, 08, 10, 14, 20

3 Series no.

4 Design no.

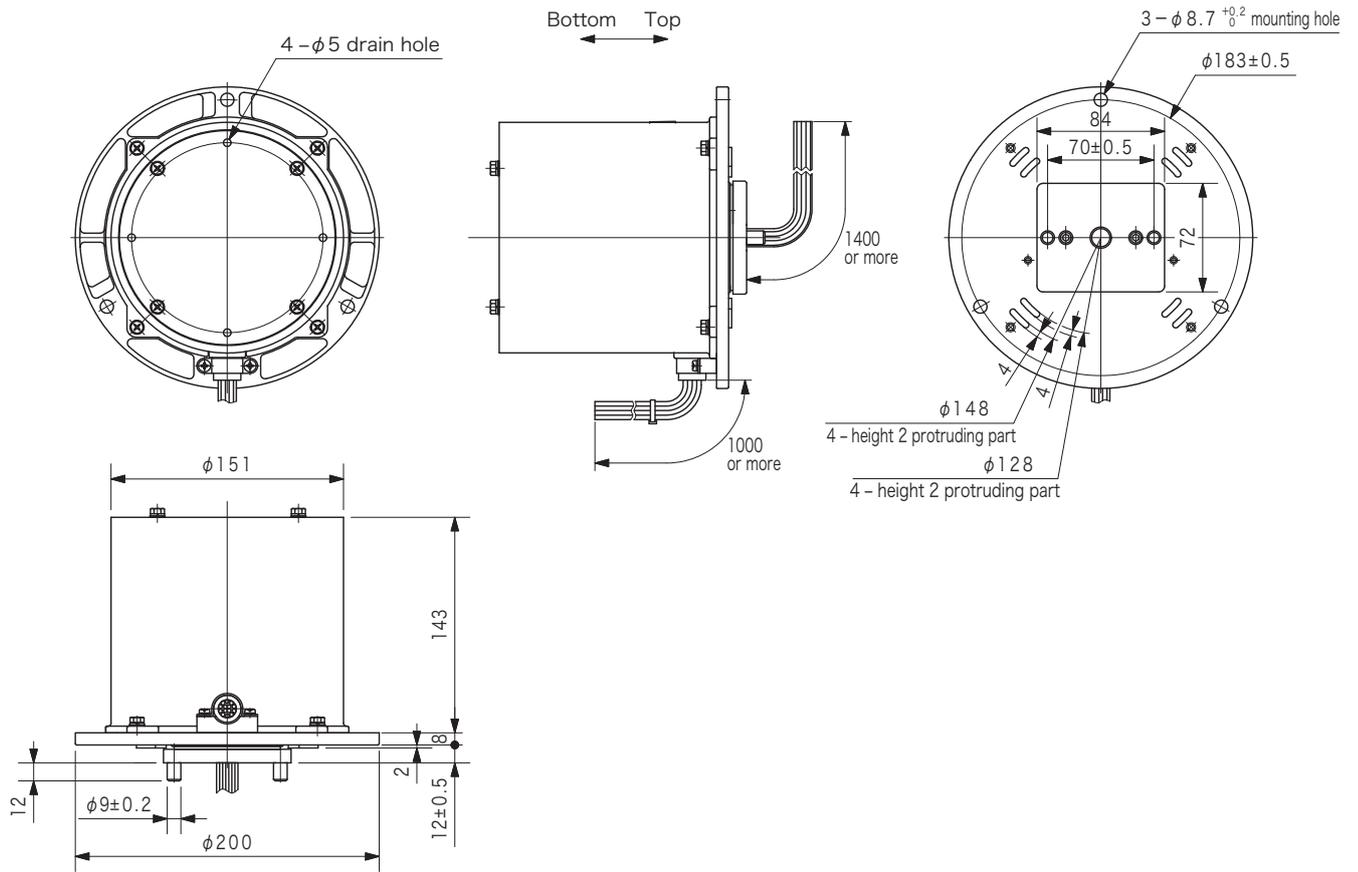
Specifications

TKF-**-100-21

No. of poles	2, 3, 4, 6, 8, 10, 14, 20
Electrical specifications	Rated voltage: DC 24 V Rated current: DC 10 mA to 10 A Contact resistance: Less than 50 mΩ Insulation resistance: More than 500 kΩ (measured using 500 V insulation resistance meter) Dielectric strength: 1 minute at 500 V
Rotational torque	2.0 N·m
Water resistance	Equivalent to JIS D 0203 S1 specification
Vibration resistance	JIS D 1601 Class 3B, Grade 70 (70 m/s ² (7G))
Impact resistance	245 m/sec ² (25G) (3 times each in up/down, left/right and front/back directions) Time: 0.011 to 0.02 sec.
Working temperature range	-20 °C~+75 °C
Shelf temperature range	-30 °C~+80 °C
Relative humidity	30% to 95% (no formation of condensation)
Durability	More than 50000 return rotations at a rotational speed of 10 min ⁻¹
Paint color	7.5BG4/1.5

Dimensions

TKF-20-100-21



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