

NZ series rotor flange waterproof conductive Slip Rings



The NZ series rotor flange conductive waterproof slip rings are a general term for a series of waterproof slip rings with connecting flanges on the rotor part. They are solid slip rings suitable for installation on the flange end face. Due to the absence of through holes in the middle, they can achieve more circuits and higher current under the premise of the same outer diameter. They are commonly used for rotor flange end face installation, with rotor leads exiting from the end face. Due to the sufficient internal space, these products are convenient for internal wiring and special shielding module design, making them more stable and reliable. Usually, these products are used for customizing various sensitive signals or encoder signals.

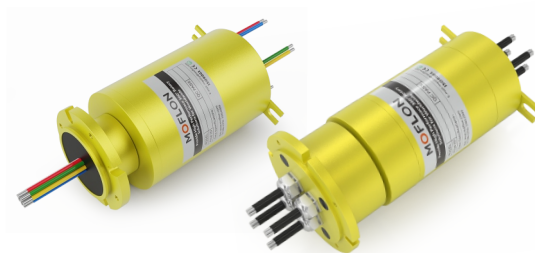
NZ Series Models

Model#	OD(mm)	Circuits(Rings)	Current(A)	Maximum Voltage(VDC/VAC)
NZ056-IP66	56	1~48	Signal(2A)~10A	0~440
NZ056-IP68	59.5	1~48	Signal(2A)~10A	0~440
NZ086-IP66	86	1~60	Signal(2A)~10A	0~690
NZ086-IP68	90	1~60	Signal(2A)~10A	0~690

60% of MOFLON's sales are customized solutions, please contact customer service for special requirements.

NZ056 Series

The NZ056 series rotor flange waterproof conductive slip rings refer to a series of waterproof slip rings with a rotor part of 56mm outer diameter and a connecting flange. These are solid slip rings suitable for installation on the flange end face.



Part# Explanation

NZ 056-P 0610-S 06-IP66

NZ: Rotor flange waterproof electrical slip ring series code

056: OD56mm

P: power ring

0610: 06-6rings; rated 0~10A/ring

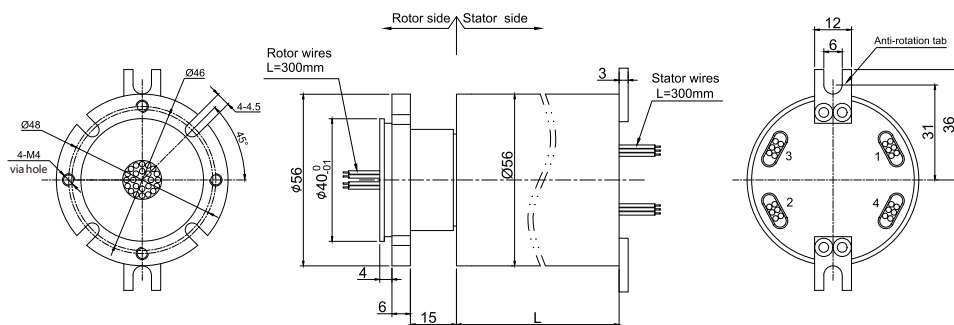
IP66: Waterproof Rating

06: 6 rings (0~5A/Ring)

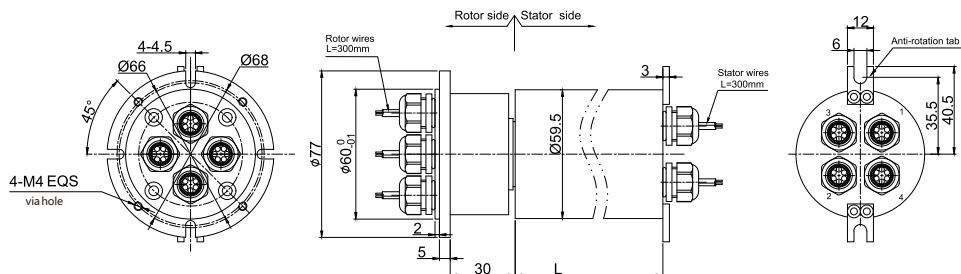
S: Signal

Overall Dimension Drawing

NZ056-IP66



NZ056-IP68



Part# List

Selection table for NZ056 series waterproof slip rings							
Part#	10A	Signal/5A	Length-L (mm)	Part#	10A	Signal/5A	Length-L (mm)
NZ056-S06-IP66	0	6	53	NZ056-S06-IP68	0	6	76
NZ056-P0610-IP66	6	0	53	NZ056-P0610-IP68	6	0	76
NZ056-S12-IP66	0	12	69.8	NZ056-S12-IP68	0	12	92.8
NZ056-P0610-S06-IP66	6	6	69.8	NZ056-P0610-S06-IP68	6	6	92.8
NZ056-P1210-IP66	12	0	69.8	NZ056-P1210-IP68	12	0	92.8
NZ056-S18-IP66	0	18	86.6	NZ056-S18-IP68	0	18	109.6
NZ056-P0610-S12-IP66	6	12	86.6	NZ056-P0610-S12-IP68	6	12	109.6
NZ056-P01210-S06-IP66	12	6	86.6	NZ056-P01210-S06-IP68	12	6	109.6
NZ056-P1810-IP66	18	0	86.6	NZ056-P1810-IP68	18	0	109.6
NZ056-S24-IP66	0	24	103.4	NZ056-S24-IP68	0	24	126.4
NZ056-P0610-S18-IP66	6	18	103.4	NZ056-P0610-S18-IP68	6	18	126.4
NZ056-P1210-S12-IP66	12	12	103.4	NZ056-P1210-S12-IP68	12	12	126.4
NZ056-P1810-S06-IP66	18	6	103.4	NZ056-P1810-S06-IP68	18	6	126.4
NZ056-P2410-IP66	24	0	103.4	NZ056-P2410-IP68	24	0	126.4
NZ056-S30-IP66	0	30	120.2	NZ056-S30-IP68	0	30	143.2
NZ056-P0610-S24-IP66	6	24	120.2	NZ056-P0610-S24-IP68	6	24	143.2
NZ056-P1210-S18-IP66	12	18	120.2	NZ056-P1210-S18-IP68	12	18	143.2
NZ056-P1810-S12-IP66	18	12	120.2	NZ056-P1810-S12-IP68	18	12	143.2
NZ056-P2410-S06-IP66	24	6	120.2	NZ056-P2410-S06-IP68	24	6	143.2
NZ056-P3010-IP66	30	0	120.2	NZ056-P3010-IP68	30	0	143.2
NZ056-S36-IP66	0	36	140	NZ056-S36-IP68	0	36	163
NZ056-P0610-S30-IP66	6	30	140	NZ056-P0610-S30-IP68	6	30	163
NZ056-P1210-S24-IP66	12	24	140	NZ056-P1210-S24-IP68	12	24	163
NZ056-P1810-S18-IP66	18	18	140	NZ056-P1810-S18-IP68	18	18	163
NZ056-P2410-S12-IP66	24	12	140	NZ056-P2410-S12-IP68	24	12	163
NZ056-P3010-S06-IP66	30	6	140	NZ056-P3010-S06-IP68	30	6	163
NZ056-P3610-IP66	36	0	140	NZ056-P3610-IP68	36	0	163
NZ056-S42-IP66	0	42	156.8	NZ056-S42-IP68	0	42	179.8
NZ056-P0610-S36-IP66	6	36	156.8	NZ056-P0610-S36-IP68	6	36	179.8
NZ056-P1210-S30-IP66	12	30	156.8	NZ056-P1210-S30-IP68	12	30	179.8
NZ056-P1810-S24-IP66	18	24	156.8	NZ056-P1810-S24-IP68	18	24	179.8
NZ056-P2410-S18-IP66	24	18	156.8	NZ056-P2410-S18-IP68	24	18	179.8
NZ056-P3010-S12-IP66	30	12	156.8	NZ056-P3010-S12-IP68	30	12	179.8
NZ056-P3610-S06-IP66	36	6	156.8	NZ056-P3610-S06-IP68	36	6	179.8
NZ056-P4210-IP66	42	0	156.8	NZ056-P4210-IP68	42	0	179.8
NZ056-S48-IP66	0	48	173.6	NZ056-S48-IP68	0	48	196.6
NZ056-P0610-S42-IP66	6	42	173.6	NZ056-P0610-S42-IP68	6	42	196.6
NZ056-P1210-S36-IP66	12	36	173.6	NZ056-P1210-S36-IP68	12	36	196.6
NZ056-P1810-S30-IP66	18	30	173.6	NZ056-P1810-S30-IP68	18	30	196.6
NZ056-P2410-S24-IP66	24	24	173.6	NZ056-P2410-S24-IP68	24	24	196.6
NZ056-P3010-S18-IP66	30	18	173.6	NZ056-P3010-S18-IP68	30	18	196.6
NZ056-P3610-S12-IP66	36	12	173.6	NZ056-P3610-S12-IP68	36	12	196.6
NZ056-P4210-S06-IP66	42	6	173.6	NZ056-P4210-S06-IP68	42	6	196.6
NZ056-P4810-IP66	48	0	173.6	NZ056-P4810-IP68	48	0	196.6

Note: N channels 10A rings parallel can be used as 1 channel N*10A current. For example: 2 rings 10A parallel could be used as 1 wires 20A,10A,5A (signal) can combine freely in any way.It can be customized based on standard slip ring,please contact customer service for more detmalls.

Specifications

Electrical Data		
Parameter	Value	
	Power	Signal
Rated Voltage	0~400VAC/VDC	0~440VAC/VDC
Insulation Resistance	≥1000MΩ/500VDC	≥1000MΩ/500VDC
Dielectric Strength	1mm² Cable	0.2mm² Cable
Lead Length	Standard 300mm (It can be adjusted according to requirements)	
Lead Wires	500VAC@50Hz,60s	
Electrical Noise	< 0.01Ω	
Mechanical Data		
Parameter	Value	
Rotating Speed	100RPM	
Working Temperature	-30℃~80℃/-45℃~80℃(Military optional)	
Operating Humidity	0~85% RH/0~97% RH(Military optional)	
Housing Materia	0.1N.m; +0.03N.m/6rings	
Rotational torque	Aluminum alloy / Aluminum alloy + Stainless steel	
Protection Grade	IP66/IP68	

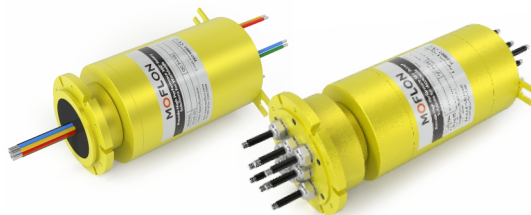
Options for custom slip ring

Note: The following special requirements can be customized, with delivery times increasing by 3 to 15 days and costs increasing by 5% to 50%. Most of our basic components are standardized and modularized, and non-standard customization can also significantly reduce costs and delivery times.

- ① The outlet mode and length of the rotor and stator can be customized.
- ② Due to structural constraints, customization can be made according to specified length, height, or outer diameter.
- ③ Optional aviation plugs, terminals, and heat-shrink tubing are available.
- ④ Hybrid slip rings for servo system signals, power lines, and encoder lines from Yaskawa, Panasonic, Siemens, etc.
- ⑤ It supports mixed high-speed data transmission (including various industrial buses such as Ethernet, USB, RS232, Rs485, Profibus, CanBUS, CANOPEN, DeviceNET, CC-LINK, ProfiNET, EtherCAT, etc.).
- ⑥ Mixing of temperature control signals and thermocouple signals.
- ⑦ Customized for shockproof, high-temperature, and other special environments.
- ⑧ It can be integrated with pneumatic, hydraulic rotary joints to form a hybrid pneumatic-electric-hydraulic slip ring.
- ⑨ Military grade.
- ⑩ Requirements for stainless steel casing.

Technical support email: technical@moflon.com

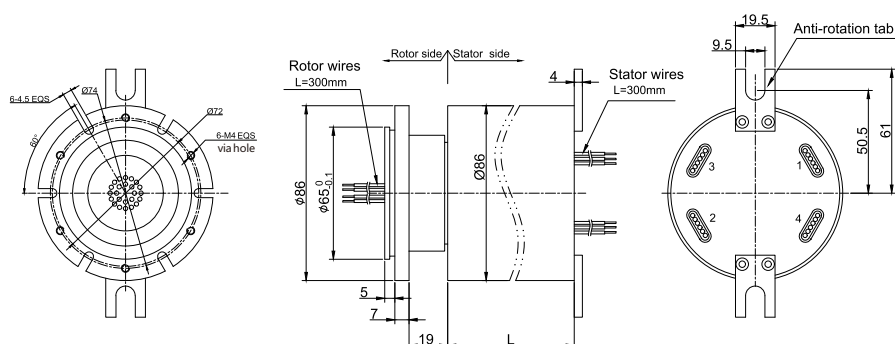
The NZ086 series rotor flange waterproof conductive slip rings refer to a series of waterproof slip rings with a rotor part of 86mm outer diameter and a connecting flange. These are solid slip rings suitable for installation on the flange end face.



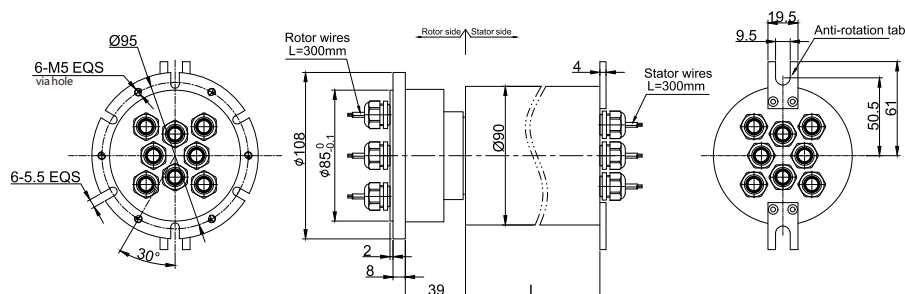
NZ 086-P 0610-S 06-IP66

NZ: Rotor flange waterproof electrical slip ring series code	IP66: Waterproof Rating
086: OD86mm	06:6 rings(0~5A/Ring)
P:power ring	S:Signal
0610:06-6rings;rated 0~10A/ring	

NZ086-IP66



NZ086-IP68



Part# List

Selection table for NZ086 series waterproof slip rings							
Part#	10A	Signal/5A	Length-L (mm)	Part#	10A	Signal/5A	Length-L (mm)
NZ086-S06-IP66	0	6	62.2	NZ086-S06-IP68	0	6	87.2
NZ086-P0610-IP66	6	0	62.2	NZ086-P0610-IP68	6	0	87.2
NZ086-S12-IP66	0	12	82.6	NZ086-S12-IP68	0	12	107.6
NZ086-P0610-S06-IP66	6	6	82.6	NZ086-P0610-S06-IP68	6	6	107.6
NZ086-P1210-IP66	12	0	82.6	NZ086-P1210-IP68	12	0	107.6
NZ086-S18-IP66	0	18	103	NZ086-S18-IP68	0	18	128
NZ086-P0610-S12-IP66	6	12	103	NZ086-P0610-S12-IP68	6	12	128
NZ086-P01210-S06-IP66	12	6	103	NZ086-P01210-S06-IP68	12	6	128
NZ086-P1810-IP66	18	0	103	NZ086-P1810-IP68	18	0	128
NZ086-S24-IP66	0	24	123.4	NZ086-S24-IP68	0	24	148.4
NZ086-P0610-S18-IP66	6	18	123.4	NZ086-P0610-S18-IP68	6	18	148.4
NZ086-P1210-S12-IP66	12	12	123.4	NZ086-P1210-S12-IP68	12	12	148.4
NZ086-P1810-S06-IP66	18	6	123.4	NZ086-P1810-S06-IP68	18	6	148.4
NZ086-P2410-IP66	24	0	123.4	NZ086-P2410-IP68	24	0	148.4
NZ086-S30-IP66	0	30	143.8	NZ086-S30-IP68	0	30	168.8
NZ086-P0610-S24-IP66	6	24	143.8	NZ086-P0610-S24-IP68	6	24	168.8
NZ086-P1210-S18-IP66	12	18	143.8	NZ086-P1210-S18-IP68	12	18	168.8
NZ086-P1810-S12-IP66	18	12	143.8	NZ086-P1810-S12-IP68	18	12	168.8
NZ086-P2410-S06-IP66	24	6	143.8	NZ086-P2410-S06-IP68	24	6	168.8
NZ086-P3010-IP66	30	0	143.8	NZ086-P3010-IP68	30	0	168.8
NZ086-S36-IP66	0	36	167.2	NZ086-S36-IP68	0	36	192.2
NZ086-P0610-S30-IP66	6	30	167.2	NZ086-P0610-S30-IP68	6	30	192.2
NZ086-P1210-S24-IP66	12	24	167.2	NZ086-P1210-S24-IP68	12	24	192.2
NZ086-P1810-S18-IP66	18	18	167.2	NZ086-P1810-S18-IP68	18	18	192.2
NZ086-P2410-S12-IP66	24	12	167.2	NZ086-P2410-S12-IP68	24	12	192.2
NZ086-P3010-S06-IP66	30	6	167.2	NZ086-P3010-S06-IP68	30	6	192.2
NZ086-P3610-IP66	36	0	167.2	NZ086-P3610-IP68	36	0	192.2
NZ086-S42-IP66	0	42	187.6	NZ086-S42-IP68	0	42	212.6
NZ086-P0610-S36-IP66	6	36	187.6	NZ086-P0610-S36-IP68	6	36	212.6
NZ086-P1210-S30-IP66	12	30	187.6	NZ086-P1210-S30-IP68	12	30	212.6
NZ086-P1810-S24-IP66	18	24	187.6	NZ086-P1810-S24-IP68	18	24	212.6
NZ086-P2410-S18-IP66	24	18	187.6	NZ086-P2410-S18-IP68	24	18	212.6
NZ086-P3010-S12-IP66	30	12	187.6	NZ086-P3010-S12-IP68	30	12	212.6
NZ086-P3610-S06-IP66	36	6	187.6	NZ086-P3610-S06-IP68	36	6	212.6
NZ086-P4210-IP66	42	0	187.6	NZ086-P4210-IP68	42	0	212.6
NZ086-S48-IP66	0	48	210.2	NZ086-S48-IP68	0	48	235.2
NZ086-P0610-S42-IP66	6	42	210.2	NZ086-P0610-S42-IP68	6	42	235.2
NZ086-P1210-S36-IP66	12	36	210.2	NZ086-P1210-S36-IP68	12	36	235.2
NZ086-P1810-S30-IP66	18	30	210.2	NZ086-P1810-S30-IP68	18	30	235.2
NZ086-P2410-S24-IP66	24	24	210.2	NZ086-P2410-S24-IP68	24	24	235.2
NZ086-P3010-S18-IP66	30	18	210.2	NZ086-P3010-S18-IP68	30	18	235.2
NZ086-P3610-S12-IP66	36	12	210.2	NZ086-P3610-S12-IP68	36	12	235.2
NZ086-P4210-S06-IP66	42	6	210.2	NZ086-P4210-S06-IP68	42	6	235.2
NZ086-P4810-IP66	48	0	210.2	NZ086-P4810-IP68	48	0	235.2
NZ086-S60-IP66	0	60	251	NZ086-S60-IP68	0	60	276
NZ086-P6010-IP66	60	0	251	NZ086-P6010-IP68	60	0	276

Note: N channels 10A rings parallel can be used as 1 channel N*10A current. For example: 2 rings 10A parallel could be used as 1 wires 20A, 10A, 5A (signal) can combine freely in any way. It can be customized based on standard slip ring, please contact customer service for more details.

Specifications

Electrical Data		
Parameter	Value	
	Power	Signal
Rated Voltage	0~400VAC/VDC	0~440VAC/VDC
Insulation Resistance	≥1000MΩ/500VDC	≥1000MΩ/500VDC
Dielectric Strength	1mm ² Cable	0.2mm ² Cable
Lead Length	Standard 300mm (It can be adjusted according to requirements)	
Lead Wires	500VAC@50Hz, 60s	
Electrical Noise	< 0.01Ω	

Mechanical Data	
Parameter	Value
Rotating Speed	100RPM
Working Temperature	-30°C~80°C/-45°C~80°C(Military optional)
Operating Humidity	0~85% RH/0~97% RH(Military optional)
Housing Material	0.1N.m; +0.03N.m/6rings
Rotational torque	Aluminum alloy / Aluminum alloy + Stainless steel
Protection Grade	IP66/IP68

Options for custom slip ring

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- ⑤ It supports mixed high-speed data transmission (including various industrial buses such as Ethernet, USB, RS232, RS485, Profibus, CanBUS, CANOPEN, DeviceNET, CC-LINK, ProfinET, EtherCAT, etc.).
- ⑥ Mixing of temperature control signals and thermocouple signals.
- ⑦ Customized for shockproof, high-temperature, and other special environments.
- ⑧ It can be integrated with pneumatic, hydraulic rotary joints to form a hybrid pneumatic-electric-hydraulic slip ring.
- ⑨ Military grade.
- ⑩ Requirements for stainless steel casing.

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