

# HF0118-32 series 18GHz singal channel RF rotary joint slip ring

Signal Channel, Frequency DC~18GHz, OD 32.8mm



Senring HF0118-32 series RF rotary joint is used transmitting of analog and digital signals, RF Channel, can be customized to combine power/signal transmitting (12~24 wires) ,2.4(K)-F connector, stator flange

## Part No. Description

### HF0118-32 - Power Circuits - Signal Circuits

Single Channel RF Rotary Joint  
Frequency DC~18GHz, OD 32.8mm

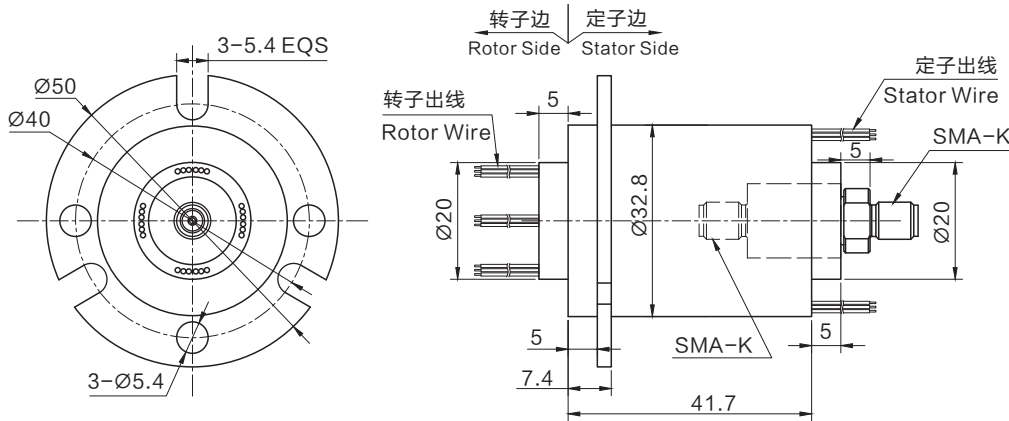
For example:  
06S:6 circuits signal@2A  
12S:12 circuits signal@2A

For example:  
0610:6 circuits@10A  
1230:12 circuits@30A

## Examples

HF0118-32: singal channel RF coaxial rotary joint, frequency DC~18GHz, OD 32.8mm ;

HF0118-32-12S: 1 channel RF rotary joint+12 circuits signal@2A, frequency DC~18GHz, OD 32.8mm ;



## Standard Model List

Model	ListRF Channel	Frequency	Circuits no. (10A)	Circuits no. (0~2A)	Length L(mm)
HF0118-32-12	1 channel	DC~18GHz	0	12 channels	41.7mm
HF0118-32-24	1 channel	DC~18GHz	0	24 channels	41.7mm

## Rotary joint Spec.

Connector type	2.4(K)-F (50Ω)	Style	I type
Frequency	DC ~ 18 GHz	Phase WOW ( Max degree)	1°
VSWR(max)	1.3@DC ~ 10 GHz 1.4@DC~ 18 GHz	Insertion loss	0.25 dB @ DC ~10 GHz 0.30 dB @10 ~ 18 GHz
VSWR fluctuation(max)	0.05	Insertion loss fluctuation	0.05 dB
Peak power(max)	3000W	Average power(max)	500 W @1 GHz 200 W @6GHz 100 W @12GHz 30 W @18GHz
Rotating speed(max)	250RPM	working life	> 10 millions for ref(depe-nds on working conditions)
Starting torque(max)	0.5N.cm	Rotating torque(max)	0.5 N.cm
Connector axial load(max)	± 0.1N	Connector radial load(max)	± 0.1N
Insulating material	PTFE	IP grade	IP 40 acc. EN 60529
Temperature	-30~+85°C(work temperature) -30~+85°C(storage temperature)	Humidity	95% (work humidity) 85% (storage humidity)

## Electrical slip ring Spec.

Mechanical		Electrical		
Working life	> 10 millions for ref (depends on working conditions)	Spec.	Power	Signal
		Voltage range	0~240VAC/VDC	0~240VAC/VDC
Rotating speed	250RPM	Insulation resistance	$\geq 300M\Omega/300VDC$	$\geq 300M\Omega/300VDC$
Temperature	-30°C~80°C	Lead wire spec.	AWG#26 Silver-plated teflon	
Humidity	0~85% RH	Lead wire length	standard 150mm(can be customized)	
Contact material	gold-gold	Insulation resistance	300VAC@50Hz,60s	
Housing material	Aluminum alloy	Electrical noise	< 0.01Ω	
Torque	0.05N.m+0.01N.m/6 channels			
IP grade	IP51			

## Color Code of Lead Wire

ring #	1	2	3	4	5	6	7	8	9	10	11	12
color	BLK	BRN	RED	ORG	YEL	GRN	BLU	PUR	GRY	WHT	PINK	LGT BLU
ring #	13	14	15	16	17	18	19	20	21	22	23	24
color	WHT/BLK	WHT/BRN	WHT/RED	WHT/ORG	WHT/YEL	WHT/GRN	WHT/BLU	WHT/PUR	WHT/GRY	BLK/RED	BLK/BRN	Transparent

Remark: "1" : the first wire from rotor side , HF0118-32-12S wire color sequence: BLK/BRN/RED/ORG/YEL/GRN/BLU PUR/GRY/WHT/PINK/LGT BLU,24 color wires asone group , if more than 24wires, repeat as sequence , use number tube to tell group 1#, 2#....