

Rotary Joint || BN 635730



**Radio frequency characteristics**

Channel designation	Channel 1
Waveguide interface aperture	R 120 per IEC 60153-2 (WR 75 per EIA RS-261)
Waveguide interface connector	Compatible with UBR 120 per IEC 60154-2
Interface material / surface finish	Aluminum alloy / none
Interface orientation	style I
Frequency range	10.75 to 14.50 GHz
Peak power capability	14 kW <sup>RF1)</sup> 300 W <sup>RF2)</sup> 200 W <sup>RF3)</sup>
Average power capability	800 W <sup>RF1)</sup> 300 W <sup>RF2)</sup> 200 W <sup>RF3)</sup>
VSWR, max.	1.3 @ 10.75 to 12.25 GHz 1.2 @ 12.25 to 14.50 GHz
VSWR variation over rotation, max. / typ.	0.1 / 0.05
Insertion loss, max. / typ.	0.2 dB / 0.1 dB
Insertion loss variation over rotation, max. / typ.	0.05 dB / 0.02 dB

<sup>RF1)</sup> Condition: Sea level

<sup>RF2)</sup> Condition: Operating altitude if not pressurized, max. 12000 m

<sup>RF3)</sup> Condition: Operating altitude if not pressurized, max. 16800 m

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**Mechanical characteristics**

Rotating speed, max. / nominal	300 rpm / 200 rpm
Rotating direction (view from the top)	both directions
Life, min.	200 x 10 <sup>6</sup> revolutions
Torque (room temperature), max.	0.2 Nm @ start-up 0.2 Nm @ rotation
Interface loads, max.	±10 N in axial direction ±10 N in radial direction
Case material	aluminum alloy, sea water resistant
Case surface finish	no finish
IP protection level	IP40
Weight, approx.	0.3 kg
Marking	laser engraving

**Environmental conditions**

<b>Operation</b>	
Ambient temperature range	-55 to +71°C
Relative humidity, max.	95% (non-condensing)
<b>Storage</b>	
Ambient temperature range	-55 to +85°C
Relative humidity, max.	95% (non-condensing)

**Applicable documents**

Drawing	635730-0E, Issue C
Technical information	"Rotary Joints – Glossary", Technical Document TD-00021, Spinner GmbH