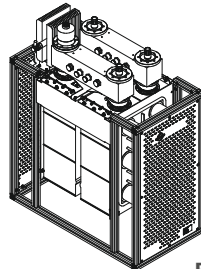
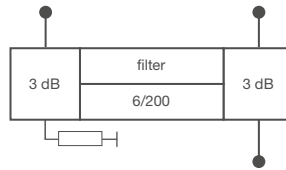
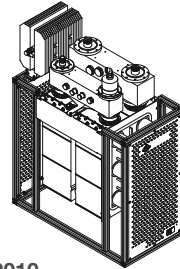


## CCS UHF CIB Combiners

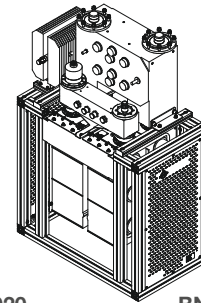
- **CCS** compact design
- For 6, 7 and 8 MHz channel bandwidth
- Tuneable within the whole UHF range
- Integrated mask filters for DTV
- Adjacent channel operation
- Temperature compensated
- Liquid cooled filters



BN 576055A2010



BN 576056A2020



BN 576057A2020

Part Number	Liquid Cooled	BN 576055A2010	BN 576056A2010	BN 576057A2020	BN 576058A2020
Frequency range		470 - 800 MHz			
Channel spacing		≥ 0			
<b>Narrowband input</b>		3 1/8" EIA male			
Filter type integrated cavities/size		<b>6/200 ≡ BN 616540</b>			
Temperature stability		≤ 2 kHz / K			
Harmonics attenuation		≥ 50 dB for f ≤ 860 MHz			
DTV mask filtering		DVB-T @ 8 MHz ( $\dot{U}/U_{rms}=13$ dB)	ISDB-T @ 6 MHz ( $\dot{U}/U_{rms}=13$ dB)	DVB-T @ 7 MHz ( $\dot{U}/U_{rms}=13$ dB)	
Average input power The input power of liquid cooled filters must be reduced if installed more than 500 m above sea level.		≤ <b>23 kW</b> @ 0 - 1000 m ≤ <b>20 kW</b> @ 2000 m ≤ <b>18 kW</b> @ 2600 m ≤ <b>16 kW</b> @ 3200 m ≤ <b>14 kW</b> @ 3800 m ≤ <b>12 kW</b> @ 4400 m	≤ <b>20 kW</b> @ 0 - 500 m ≤ <b>18 kW</b> @ 1200 m ≤ <b>16 kW</b> @ 2000 m ≤ <b>14 kW</b> @ 2800 m ≤ <b>12 kW</b> @ 3400 m ≤ <b>10 kW</b> @ 4200 m	≤ <b>22 kW</b> @ 0 - 600 m ≤ <b>20 kW</b> @ 1400 m ≤ <b>18 kW</b> @ 2000 m ≤ <b>16 kW</b> @ 2600 m ≤ <b>14 kW</b> @ 3300 m ≤ <b>12 kW</b> @ 4000 m	
Tuning instruction		AS6194	AS6185	AS6290	
Insertion loss & mask filtering (alternative tuning on request)		470 MHz 860 MHz	470 MHz 803 MHz	470 MHz 820 MHz	
	$f_0$	≤ 0.30 dB ≤ 0.45 dB	$f_0$ ≤ 0.4 dB ≤ 0.55 dB	$f_0$	≤ 0.30 dB ≤ 0.40 dB
	$f_0 \pm 3.805$	≤ 0.70 dB ≤ 1.00 dB	$f_0 \pm 2.79$ ≤ 1.0 dB ≤ 1.40 dB	$f_0 \pm 3.2$	≤ 0.45 dB ≤ 0.55 dB
	$f_0 \pm 3.885$	≤ 0.85 dB ≤ 1.15 dB	$f_0 \pm 3.0$ ≥ 4 dB	$f_0 \pm 4.2$	≥ 13 dB
	$f_0 \pm 4.2$	≥ 4 dB	$f_0 \pm 3.15$ ≥ 8 dB	$f_0 \pm 10.5$	≥ 38 dB
	$f_0 \pm 6$	≥ 20 dB	$f_0 \pm 4.5$ ≥ 23 dB		
	$f_0 \pm 12$	≥ 40 dB	$f_0 \pm 9$ ≥ 48 dB		
		$f_0 \pm 15$ ≥ 50 dB			
Group delay variation		$\Delta\tau \leq 350$ ns	$\Delta\tau \leq 500$ ns	$\Delta\tau \leq 150$ ns	
<b>Wideband input</b>		3 1/8" EIA male	4 1/2" EIA male	52-120 BT male	6 1/8" EIA male
Average input power		≤ <b>17.5 kW</b>	≤ <b>33 kW</b>	≤ <b>60 kW</b>	≤ <b>80 kW</b>
DTV mask filtering		No			
Insertion loss		≤ 0.1 dB (non adjacent)			
<b>Output</b>		3 1/8" EIA male	4 1/2" EIA male	52-120 BT male	6 1/8" EIA male
Peak output voltage		≤ 12.5 kV	≤ 15.5 kV	≤ 19.5 kV	≤ 24 kV
Average output power		-	-	≤ 60 kW	
Isolation between inputs		≥ 35 dB			
VSWR (one WB channel)		≤ 1.06			
Dimensions (L x W x H) mm		900 x 480 x 1200		900 x 520 x 1400	
Weight		≈ 145 kg	≈ 165 kg	≈ 210 kg	≈ 230 kg
Liquid cooling interface		Stainless steel tube 12mm x 1 mm unflanged ending straight at the bottom			
Fan cooling interface		24 V DC mains adapter for 85 – 250 V AC / 46 – 63 Hz			
Environmental conditions		For limitations see „Environmental Conditions for Broadcast Products“.			