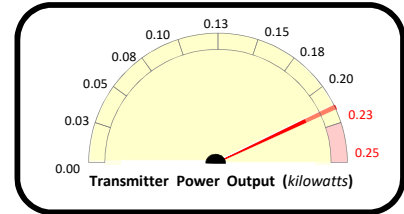


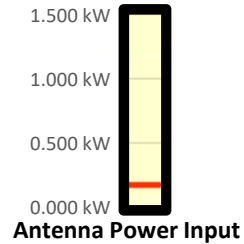
Transmitter Power Output Worksheet

Call letters: K208CK
City of License: Scottsbluff, NE
Channel: CH208D (89.5 MHz)
File No: License Modification
Facility ID: 81603
Applicant: Bible Broadcasting Network, Inc.



Effective Radiated Power (ERP): 0.170 kW

Antenna Make: Shively Labs (SHI)
Antenna Model: 6812-B
No of Elements: Two (2)
Antenna COR AGL: 23 meters AGL
Antenna COR AMSL: 1303 meters AMSL
Max Input Power: 1.500 kW
Power Gain: 1.01
Antenna Gain: 0.043 dBd
Calculated Antenna Input Power: 0.168 kW
Transmitter Rated Power: 0.250 kW
Transmitter Make/Model: Crown 250



Power Gain to Antenna gain (dBd) Conversion:
 $=\text{Log}[\text{power gain}] * 10$

Inventory of System / Insertion Losses

Explanation	Component Make/Model		Length	Loss
Typical End Connector	Generic (1@0.02 dB each)		n/a	-0.020 dBd
Main Feedline (1/2" Foam)	LMR-600	(0.800 dB/100 ft)	94 ft	-0.752 dBd
Typical End Connector	Generic (1@0.02 dB each)		n/a	-0.020 dBd
Lightning Arrestor	Polyphaser IS-50NX-CO (or equivalent)		n/a	-0.100 dBd
Typical End Connector	Generic (1@0.02 dB each)		n/a	-0.020 dBd
Jumper to Transmitter	RG-214	(2.200 dB/100 ft)	6 ft	-0.132 dBd
Typical End Connector	Generic (1@0.02 dB each)		n/a	-0.020 dBd

TOTAL SYSTEM GAIN/LOSS: -1.02 dBd
CALCULATED TRANSMITTER POWER OUTPUT: 0.215 kW
 $(1 / [10^{(1.02/10)} / \text{ERP}])$