

TRANSMITTER POWER OUTPUT CALCULATION
LPTV STATION K28DD-D
BEMIDJI, MINNESOTA
CHANNEL 28

Channel	28
Center Frequency	557 MHz
Transmission line	HJ12-50 (2-1/4-in air)
Length	365 ft
Efficiency (0.424 dB per 100 ft)	1.55 dB
Antenna	Bogner, B16UO
Polarization	Horizontal
RMS gain (dipole)	12.7 dB

Proposed Operation	
Parameter	DTV
Transmitter power output after mask filter (<i>simple mask required</i>)	0.61 dBk (1.15 kW)
Transmission line loss	1.55 dB
Antenna input power	-0.94 dBk (0.8 kW)
Maximum antenna gain	12.7 dB
Nominal effective radiated power	11.76 dBk (15 kW)