

**OUT-OF-CORE DISPLACEMENT APPLICATION**  
**LAWRENCE F. LOESCH**  
**W59EE LPTV STATION**  
**CH 30Z - 566-572 MHZ - 0.115 KW (DA)**  
**MANTEO, NORTH CAROLINA**  
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**EXHIBIT C**

**Displacement LPTV Proposed Transmission System Calculations**

Effective Radiated Power: Horizontal	0.115 kilowatt (peak)
Antenna:	Nicom Antenna Model BKU4-5
Horizontal gain (maximum):	Power gain 11.22 (10.5 dB)
Transmission Line: (90 feet)	Andrew Corporation LDF5-50A 7/8 inch foam dielectric 82.1% efficiency
Transmitter filter:	Communications and Energy Corp. Insertion loss: 0.6 dB 87.096% efficiency
Required Transmitter Power Output To Reach Effective Radiated Power:	0.0143 kilowatt (14.3 watts)