

GPS Power Control Re-radiating Worksheet	
Site Information	
Antenna ID	A1
Location Description	C3 Southeast Hangar
Coordinates, NAD 83, ddd-mm-ss.s	37-38-27.0N; 097-25-13.6W
Antenna - Receiving (RX)	
Make and Model	GPS Source L1A-PM-N(f)
Gain (dBi)	38.0
Coax	
Type or Description	LDF4.5RN-50 Helix
Attenuation @1575 MHz (dB/100 ft)	2.1
Length (ft)	25.0
Coax Loss* - Not to exceed 8 dB	0.5
Power to Controller (-105 to -50 dBm)	-92.5
Antenna - Re-radiating (TX)	
Make and Model	GPS Source L1P-NF
Antenna Height AGL (ft)	26
Gain (dBi)	3.0
Distance to nearest outer wall (ft)	110.0
Free Space Loss	72.50
Amplifier - Gain Control	
Make and Model	GPS Source GLI-Metro RK (L1 Filtered, Oscillation Detect, Antenna Alarm Monitor)
ERP Level at Controller Output (Programmed in dBm ERP)	-73
EIRP Level at Controller Output (dBm)	-70.85
Calculated Signal Strength 100 ft Outside Building (dBm EIRP)**	-140.35

* Coax Loss calculated to ensure adequate signal at Power Controller input

** = Programmed ERP Level + Antenna Gain - Free Space Loss + 2.148