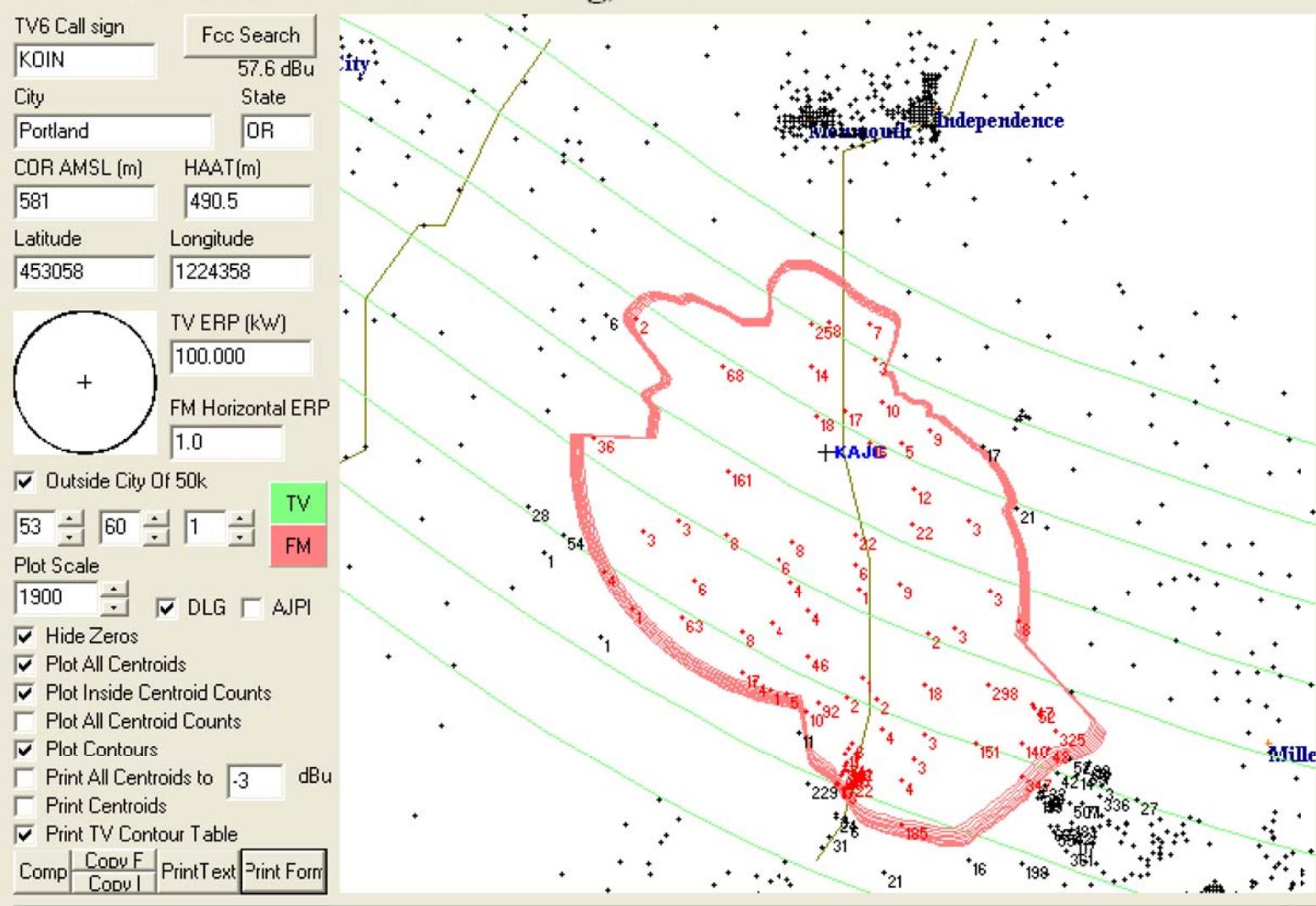


# TV6 Calculation for Millersburg, OR



## Channel Six TV Protection Study

KOIN 06 100.000kW ERP 581.0M COR AMSL 490.5M HAAT Lat. 453058 Lon. 1224358  
 KAJC 211 15.440kW ERP 150.0M COR AMSL 38.7M HAAT Lat. 444533 Lon. 1231334

Distance from TV to FM 92.6410km Azi 24.8degr Rev Azi 204.8 degr  
 Cutoff radius for channel 211 is 196 km

The FM horizontal polarization component is 1.000 kW,  
 and the area of just perceptible interference does not intersect a city of 50k,  
 so the effective ERP is ( $P_v/40+P_h$ ) 1.3860kW

The TV6 signal strength at the FM transmit site is 57.6 dBu  
 This strength is outside the 68 dBu Grade A contour,  
 allowing a 6 dB bonus to be applied to the allowable FM signal  
 to F centroids (centroids in the angles between the FM station and the TV station)

TV Contour Undesired/Desired Ratio Total Directional Total

53	13.2	66.2	72.2
54	12.2	66.2	72.2
55	11.3	66.3	72.3
56	10.5	66.5	72.5
57	9.6	66.6	72.6
58	8.7	66.7	72.7
59	7.8	66.8	72.8
60	7.0	67.0	73.0

Population in affected area 2974