

### **Preclusion to LPFM Points**

The facility contemplated herein has been studied to ensure that no preclusion will occur to LPFM “sacred” points. Due to the location of the proposed amended transmitter site being within 39km of a Top 50 Spectrum Limited Market Grid, a Site Test is required. Exhibit 1-A is a Site Study showing that no LPFM “sacred” points within the Sacramento grid have been precluded. Furthermore, there are multiple LPFM opportunities at the proposed location on channels 237, 239, 291, and 297.

Therefore, the proposed facility does not preclude a single remaining LPFM opportunity at the specified transmitter site location.

**GRID TEST - Sacramento, CA**

**Yellow Highlighting** shows Co & 1<sup>st</sup> adj channels to the proposed facility.

Sacramento, CA

Latitude 38-33-20

Longitude 121-28-08

Grid Size 21 x 21

Micro FM 100 Watts at 30m HAAT

Co-Channel and 1st Adjacent Protected

2nd Adjacent Channel Not Protected

3rd Adjacent Channel Not Protected

I.F. Not Protected

TV Channel 6 Protected

CP Records Protected

APP Records Protected

FM Translators Protected

TV Channel 6 Translators/LP Protected

Auc83 FX App Records Not Protected

Chan	Avail	Chan	Avail	Chan	Avail	Chan	Avail	Chan	Avail
200	0	220	39	240	0	260	0	280	0
201	0	221	182	241	0	261	0	281	0
202	0	222	0	242	0	262	0	282	0
203	27	223	0	243	383	263	0	283	0
204	0	224	0	244	0	264	0	284	441
205	0	225	147	245	0	265	0	285	0
206	0	226	25	246	0	266	0	286	0
207	0	227	107	247	104	267	0	287	0
208	0	228	0	248	0	268	0	288	0
209	0	229	0	249	0	269	0	289	47
210	0	230	0	250	0	270	0	290	0
211	0	231	19	251	37	271	0	291	151
212	0	232	24	252	0	272	0	292	0
213	0	233	0	253	0	273	0	293	0
214	0	234	0	254	0	274	0	294	0
215	0	235	0	255	225	275	108	295	214
216	0	236	14	256	6	276	201	296	3
217	0	237	0	257	0	277	0	297	0
218	0	238	0	258	0	278	0	298	0
219	0	239	154	259	0	279	0	299	0
								300	0

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Total 2658

Total allotments, least preclusive spacing: 46

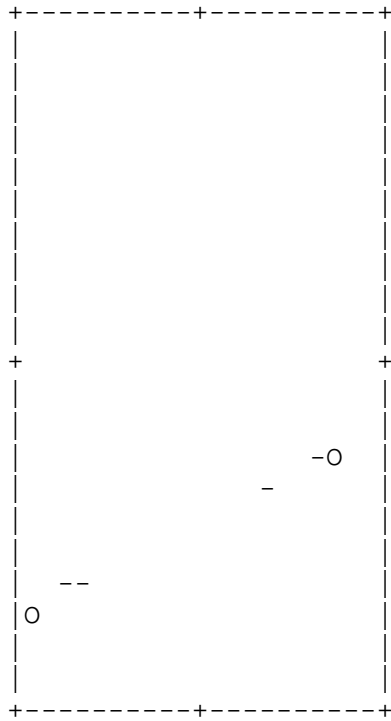
Total allotments, most preclusive spacing: 32

A diagram of a 16x16 grid with dashed lines and corner markers. The grid is divided into four 8x8 quadrants by a central dashed line. The top-right and bottom-left quadrants contain a staircase pattern of dashed lines. The top-left and bottom-right quadrants contain a staircase pattern of solid lines. The central dashed line has a small circle at its midpoint.

The diagram consists of two rectangular regions, each defined by a dashed border and a cross at the top-left corner. The top region contains a staircase-like pattern of horizontal dashed lines, with an 'O' at the bottom-left. The bottom region contains a staircase-like pattern of horizontal dashed lines, with an 'O' at the bottom-right.

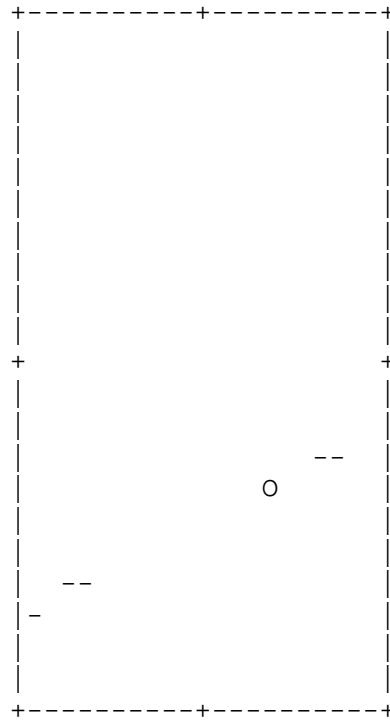
Point #285 at 38-34-20 121-31-08  
Point #001 at 38-23-20 121-18-08

Sacramento, CA  
 Latitude 38-33-20  
 Longitude 121-28-08  
 Least preclusive siting  
 Availability of Channel 256 (X)

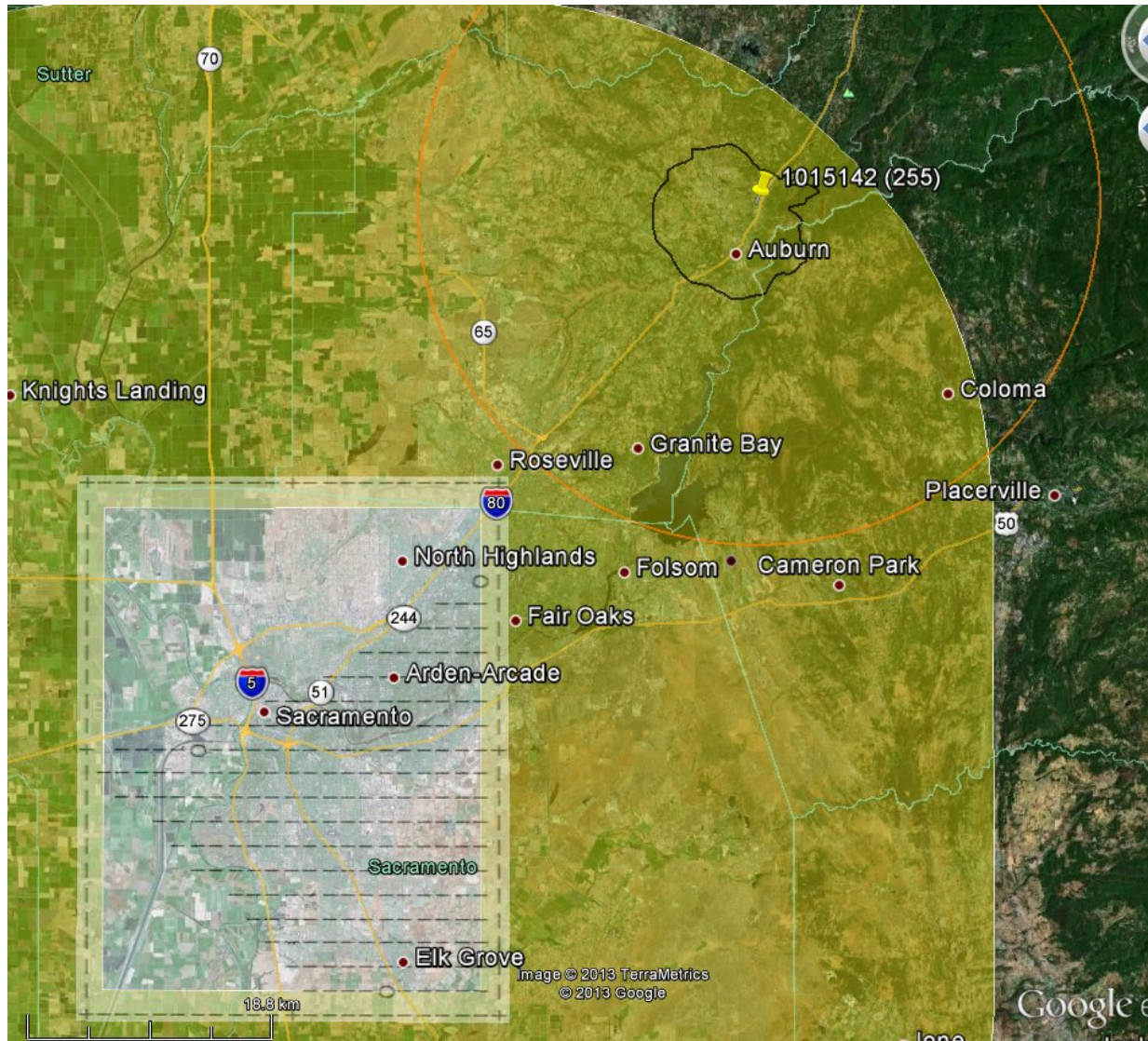


Point #423 at 38-25-20 121-38-08  
 Point #050 at 38-30-20 121-20-08

Sacramento, CA  
 Latitude 38-33-20  
 Longitude 121-28-08  
 Most preclusive siting  
 Availability of Channel 256 (X)



Point #133 at 38-29-20 121-24-08



12-radial HAAT is 139.7 m

60 dBu contour distance is 5.431 km

LPFM protected points for co-channel 255 are shown aligned to the Sacramento grid.

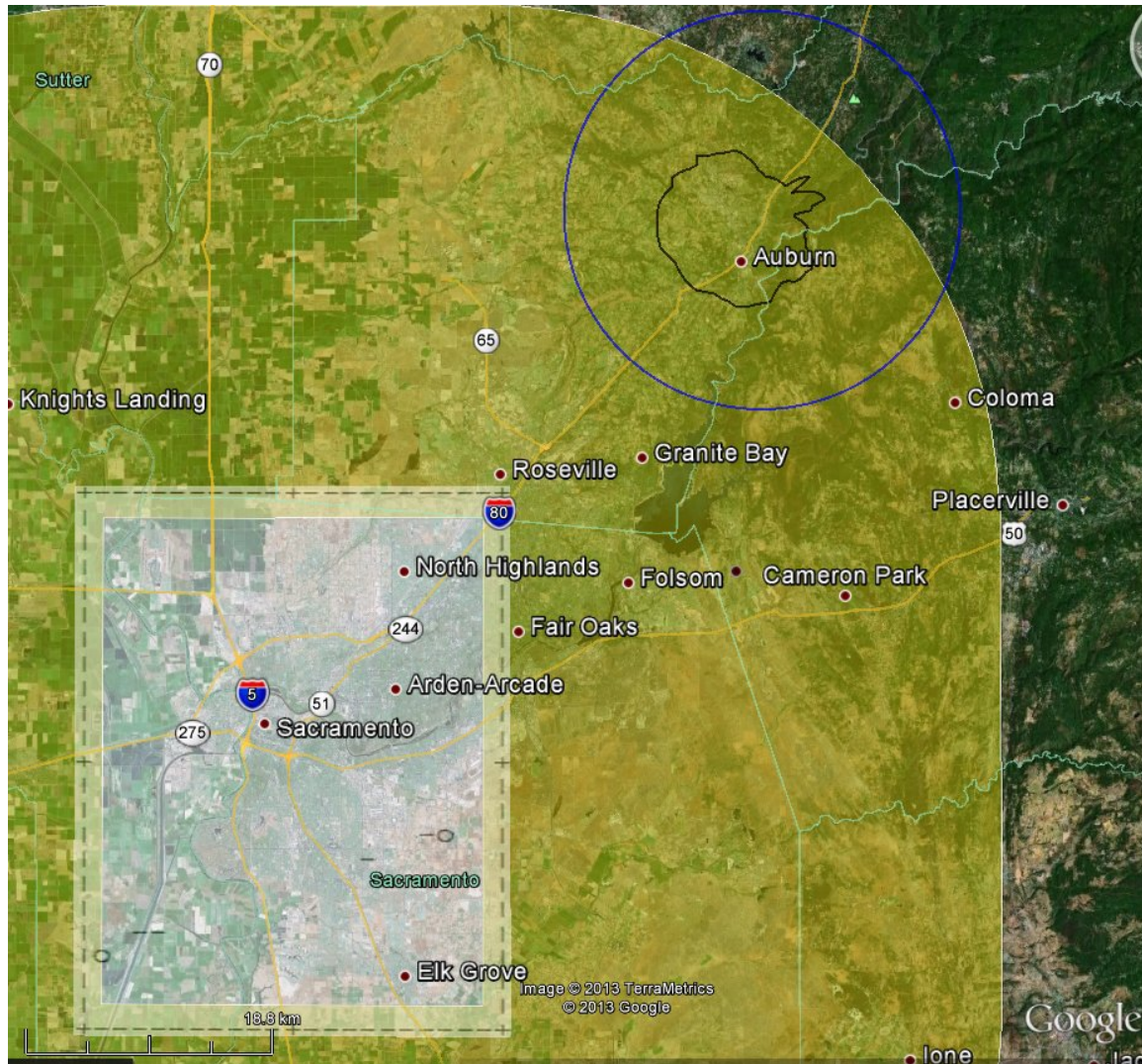
The yellow tack indicates the proposed transmitter location.

The black contour is the standard FCC F(50-50) 60dBu contour.

The orange circle contour indicates the minimum co-channel protection distance of 26 km to the proposed transmitter site (per 73.807). As can be seen, no LPFM points are within the minimum distance.

Therefore, the proposed location does not preclude any LPFM opportunities on channel 255.





12-radial HAAT is 139.7 m

60 dBu contour distance is 5.431 km

LPFM protected points for 1<sup>st</sup> adjacent channel 256 are shown aligned to Sacramento grid.

The yellow tack indicates the proposed transmitter location.

The black contour is the standard FCC F(50-50) 60dBu contour.

The blue circle contour indicates the minimum 1<sup>st</sup> adjacent channel protection distance of 15 km to the proposed transmitter site (per 73.807). As can be seen, no LPFM points are within the minimum distance.

Therefore, the proposed transmitter does not preclude any LPFM opportunities on channel 256.

**SITE TEST - Auburn, CA**

**Green highlighted channels** - indicate an LPFM opportunity is available from the proposed site

Sacramento, CA

Latitude 38-55-52

Longitude 121-03-28

Grid Size 21 x 21

Micro FM 100 Watts at 30m HAAT

Co-Channel and 1st Adjacent Protected

2nd Adjacent Channel Not Protected

3rd Adjacent Channel Not Protected

I.F. Not Protected

TV Channel 6 Protected

CP Records Protected

APP Records Protected

FM Translators Protected

TV Channel 6 Translators/LP Protected

Auc83 FX App Records Not Protected

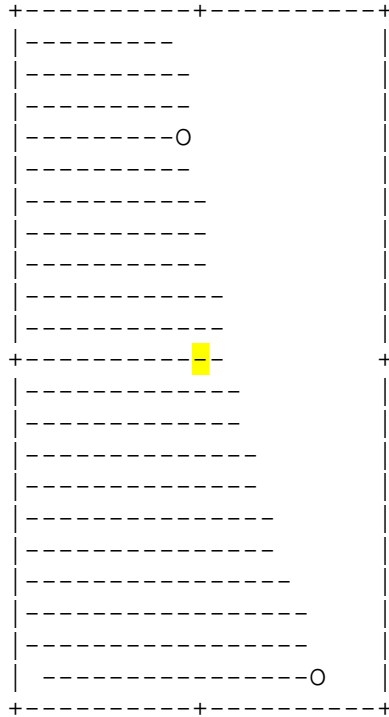
Chan	Avail	Chan	Avail	Chan	Avail	Chan	Avail	Chan	Avail
200	0	220	0	240	0	260	0	280	0
201	0	221	0	241	0	261	0	281	0
202	0	222	0	242	0	262	0	282	0
203	0	223	0	243	215	263	0	283	0
204	0	224	0	244	0	264	0	284	77
205	0	225	0	245	0	265	0	285	0
206	0	226	0	246	0	266	0	286	0
207	0	227	0	247	85	267	0	287	0
208	0	228	0	248	6	268	178	288	5
209	0	229	0	249	6	269	0	289	2
210	0	230	0	250	57	270	0	290	77
211	0	231	0	251	120	271	0	291	372
212	0	232	0	252	0	272	0	292	0
213	0	233	0	253	0	273	0	293	0
214	0	234	0	254	0	274	0	294	0
215	0	235	0	255	201	275	2	295	1
216	0	236	150	256	9	276	5	296	23
217	0	237	269	257	0	277	0	297	327
218	0	238	105	258	0	278	0	298	94
219	0	239	270	259	0	279	0	299	0
								300	0

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Total 2656

Total allotments, least preclusive spacing: 37

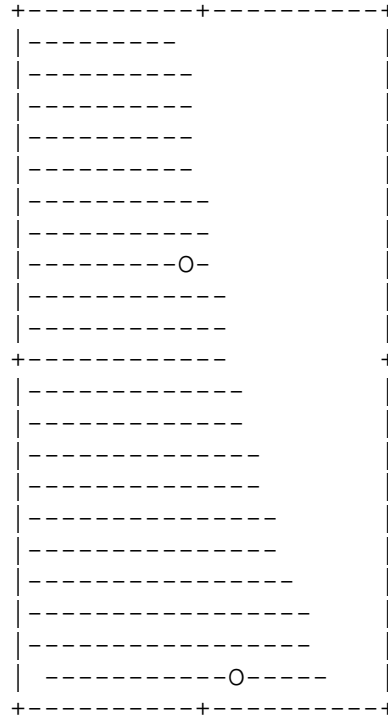
Total allotments, most preclusive spacing: 29

Sacramento, CA  
 Latitude 38-55-52  
 Longitude 121-03-28  
 Least preclusive siting  
 Availability of Channel 237 (X)



Point #064 at 38-45-52 120-56-28  
 Point #249 at 39-02-52 121-04-28

Sacramento, CA  
 Latitude 38-55-52  
 Longitude 121-03-28  
 Most preclusive siting  
 Availability of Channel 237 (X)



Point #245 at 38-58-52 121-04-28  
 Point #169 at 38-45-52 121-01-28



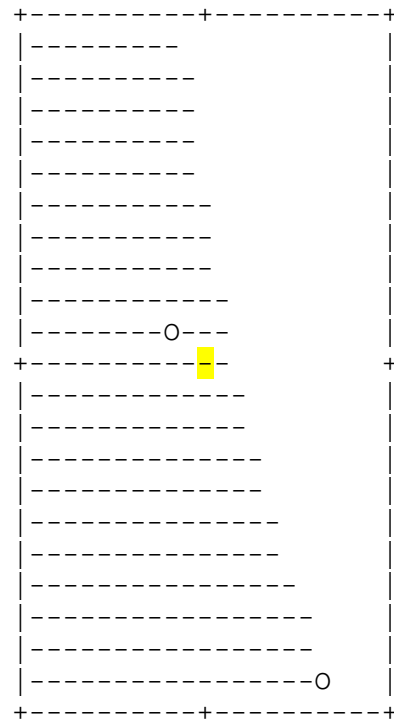
Sacramento, CA

Latitude 38-55-52

Longitude 121-03-28

Least preclusive siting

Availability of Channel 239 (X)



Point #064 at 38-45-52 120-56-28

Point #264 at 38-56-52 121-05-28

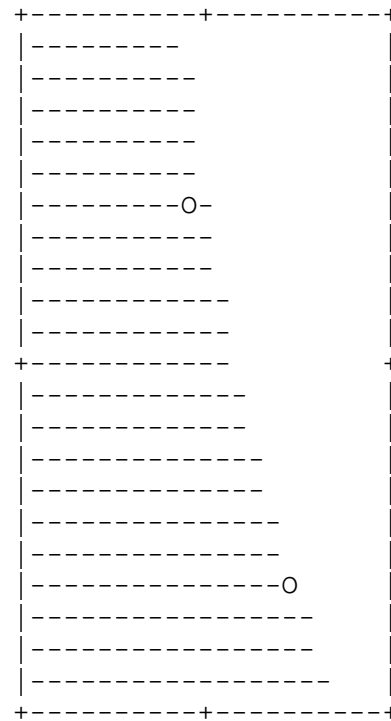
Sacramento, CA

Latitude 38-55-52

Longitude 121-03-28

Most preclusive siting

Availability of Channel 239 (X)



Point #109 at 38-48-52 120-58-28

Point #247 at 39-00-52 121-04-28

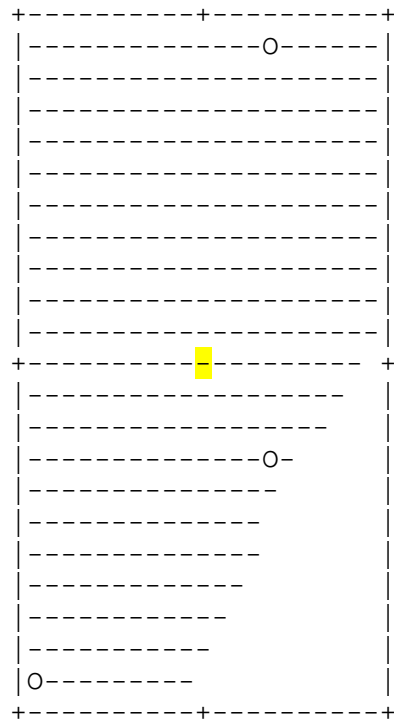
Sacramento, CA

Latitude 38-55-52

Longitude 121-03-28

Least preclusive siting

Availability of Channel 291 (X)



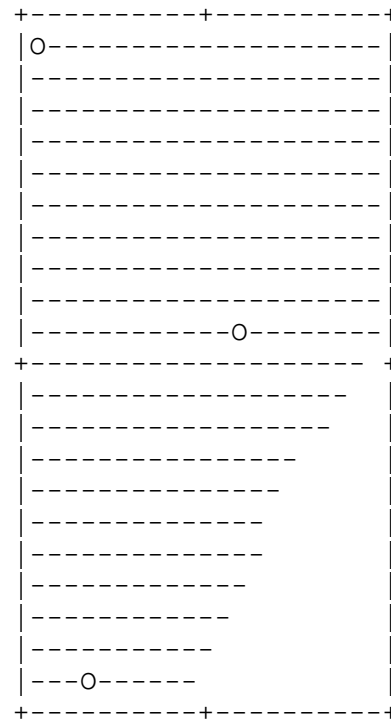
Sacramento, CA

Latitude 38-55-52

Longitude 121-03-28

Most preclusive siting

Availability of Channel 291 (X)



Point #421 at 38-45-52 121-13-28

Point #134 at 38-52-52 120-59-28

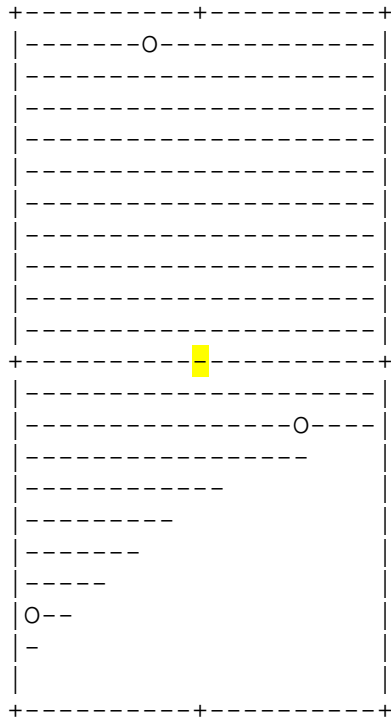
Point #147 at 39-05-52 120-59-28

Point #180 at 38-56-52 121-01-28

Point #358 at 38-45-52 121-10-28

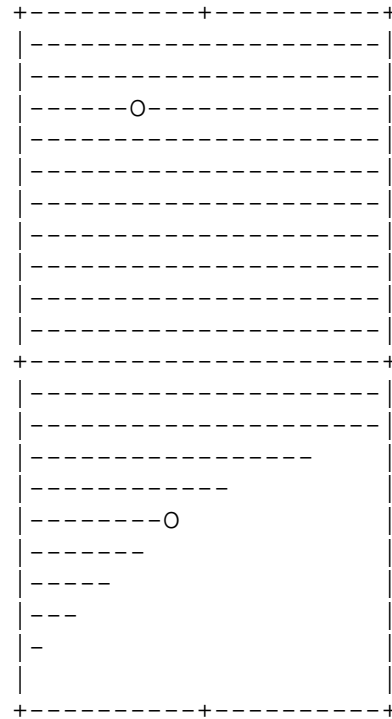
Point #441 at 39-05-52 121-13-28

Sacramento, CA  
Latitude 38-55-52  
Longitude 121-03-28  
Least preclusive siting  
Availability of Channel 297 (X)



Point #294 at 39-05-52 121-06-28  
Point #423 at 38-47-52 121-13-28  
Point #093 at 38-53-52 120-57-28

Sacramento, CA  
Latitude 38-55-52  
Longitude 121-03-28  
Most preclusive siting  
Availability of Channel 297 (X)



Point #313 at 39-03-52 121-07-28  
Point #258 at 38-50-52 121-05-28