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ENGINEERING REPORT

Cherry Hill, NJ, Channel 279D FM Translator Application

EXHIBIT 1: LPFM PRECLUSION STUDY

Priority Radio, Inc. ("Applicant") submits this technical minor amendment for its pending 1983 application for a new FM translator station at Cherry Hill, NJ. The pending application file number is BNPFT-20030312AFX.

This filing includes a site change and a channel displacement from 225 to 279. This Exhibit 1 addresses only the LPFM Preclusion Study requirements of the technical amendment. (The other technical requirements of this amendment are address in a separate document of this on-line filing.)

LPFM PRECLUSION STUDY RESULTS

This Engineering Report demonstrates that this application meet the FCC's requirements for this Auction 83 FM translator pursuant to *Creation of a Low Power FM Service, Amendment of Service Rules and Eligibility Rules for FM Broadcast Translator Stations*, Fifth Order on Reconsideration and Sixth Report and Order, FCC 12-144 (re;. December 4, 2012) ("Fifth Order on Reconsideration"). Additionally, the FCC's LPFM spectrum availability program, http://www.fcc.gov/Bureaus/MB/Databases/source_code/lpfm6.20121206.zip ("LPFM6"), is used as support for this Engineering Report.

An LPFM Preclusion Study is required by this application (based on the location of the herein proposed transmitter site) to the following *Spectrum Limited* Arbitron Metro Market:

Philadelphia, PA –

Mrkt # 7; 30 min. grid centered at N 39-57-08 W 75-09-51 (d,m,s; NAD 27).

Because a technical amendment is included with this tech box filing, an LPFM Preclusion Study is required by this application (based on the location of the herein proposed transmitter site) to the following *Spectrum Available* Arbitron Metro Market:

Atlantic City-Cape May ("Atlantic City"), NJ –

Mrkt # 145; 30 min. grid centered at N 39-21-51 W 74-25-24 (d,m,s; NAD 27).

Note that for the *Spectrum Available* Grid Studies, the LPFM6 study includes second adjacent and pending 1983 FM translator applications (inclusions that are not necessary for Spectrum Limited Grid Studies).

Metro Area Preclusion Study Results

Philadelphia Spectrum Limited Metro Market

Figure 1, attached, is the LPFM6 output file for the Philadelphia Metro Market with the study centered at the grid center.

As required by the Fifth Order on Reconsideration, this FM translator will not preclude the future use of a LPFM application from a potential LPFM channel/point located within the 30-minute Philadelphia Grid.

Atlantic City Spectrum Available Metro Market

Figure 2, attached, is the LPFM6 output file for the Atlantic City Metro Market with the study centered at the grid center.

From Figure 2 it is shown that zero channels are available within the 30-minute Grid for future LPFM on the same or first adjacent channels of the herein proposed FM translator (channels 278, 279 and 280). Also, Figure 2 demonstrates that the lower second-adjacent channel (277) also shows zero channels available within the 30-minute Grid for future LPFM.

From Figure 2 it is also shown that zero channels are available within 8 kilometers of the proposed transmitter site for future LPFM on the upper second-adjacent channel (281). The nearest grid point of the Atlantic City 30 Minute Grid (available or not) is located 36.0 km from the proposed 279D transmitter site; therefore, this proposal does not restrict any future LPFM on channel 281.

As required by the Fifth Order on Reconsideration, this FM translator will not preclude the future use of a LPFM application from a potential LPFM channel/point located within the 30-minute Atlantic City Grid.

Transmitter Site Test Study Results

This study proposes a site that is located within a Spectrum Limited Market's Study Grid and is generally not required. A *Transmitter Site Test* was made out of an abundance of caution and is submitted below showing that the study passes the test.

Figure 2, attached, is the complete LPFM6 output file for a study centered at the herein proposed translator site. From this site, the center location is shown to be available for future LPFM on channel 225. Therefore, since at least one channel exists for future LPFM at the proposed transmitter site, the transmitter site test for this application is successfully passed.

FIGURE 1

Philadelphia, PA
 Latitude 39-57-08
 Longitude 075-09-51
 Grid Size 31 x 31
 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	19	280	0
201	0	221	158	241	0	261	0	281	0
202	0	222	0	242	0	262	0	282	0
203	0	223	0	243	0	263	0	283	0
204	0	224	0	244	0	264	0	284	0
205	0	225	893	245	0	265	0	285	0
206	0	226	0	246	0	266	0	286	0
207	0	227	0	247	0	267	0	287	0
208	0	228	0	248	0	268	0	288	0
209	0	229	0	249	0	269	0	289	248
210	0	230	0	250	0	270	0	290	0
211	0	231	0	251	0	271	0	291	0
212	0	232	0	252	0	272	0	292	0
213	0	233	0	253	757	273	0	293	770
214	0	234	0	254	0	274	0	294	0
215	0	235	0	255	0	275	0	295	0
216	0	236	0	256	0	276	0	296	0
217	0	237	0	257	0	277	0	297	0
218	0	238	0	258	0	278	0	298	0
219	0	239	0	259	0	279	0	299	0
								300	0

Total	2845								

NOTE THAT ACTUAL CHANNEL STUDIES ARE NOT INCLUDED SINCE CHANNELS 278, 279 AND 280 SHOW ZERO AVAILABILITY.

{End of Figure 1}

FIGURE 2 (8 Pages)

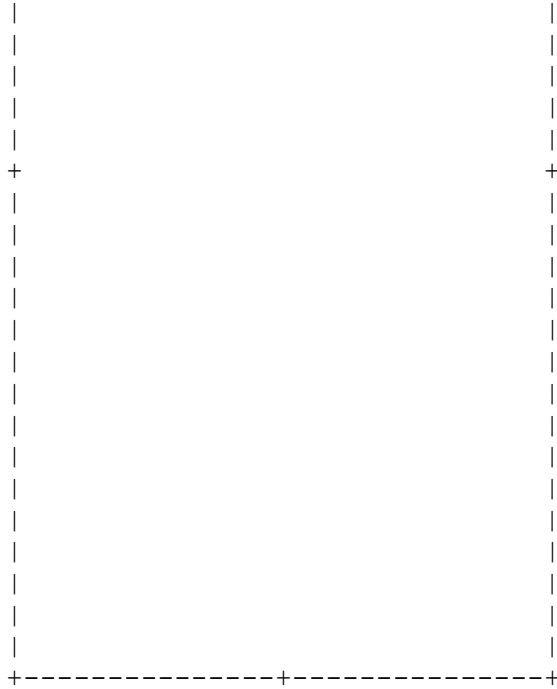
Atlantic City, NJ
 Latitude 39-21-51
 Longitude 074-25-24
 Grid Size 31 x 31
 Micro FM 100 Watts at 30m HAAT
 Co-Channel and 1st Adjacent Protected
 2nd Adjacent Channel Protected
 3rd Adjacent Channel Not Protected
 I.F. Not Protected
 TV Channel 6 Protected
 CP Records Protected
 APP Records Protected
 FM Translators Protected
 TV Channel 6 Translators/LP Protected
 Auc83 FX App Records 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	4	281	0
202	0	222	0	242	0	262	0	282	54
203	0	223	0	243	0	263	0	283	0
204	0	224	0	244	0	264	0	284	0
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	0	267	9	287	0
208	0	228	0	248	0	268	0	288	0
209	0	229	12	249	0	269	0	289	0
210	0	230	1	250	33	270	56	290	0
211	0	231	0	251	0	271	0	291	0
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	0	275	0	295	0
216	0	236	0	256	0	276	0	296	0
217	0	237	0	257	0	277	0	297	0
218	0	238	0	258	0	278	0	298	0
219	0	239	0	259	0	279	0	299	0
								300	220

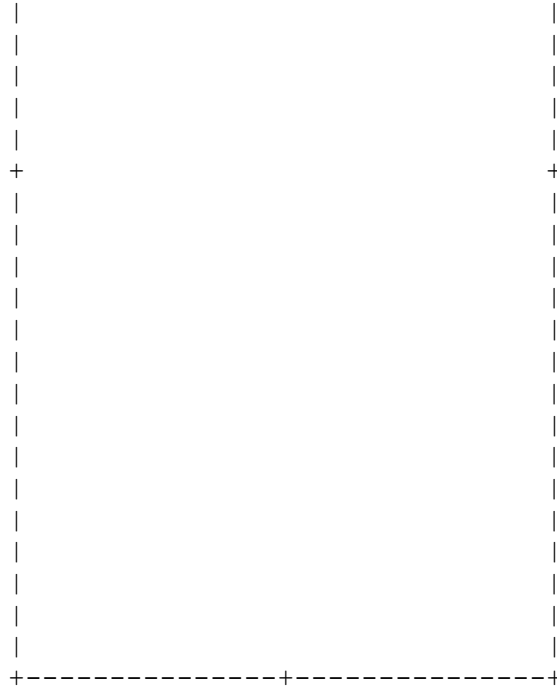
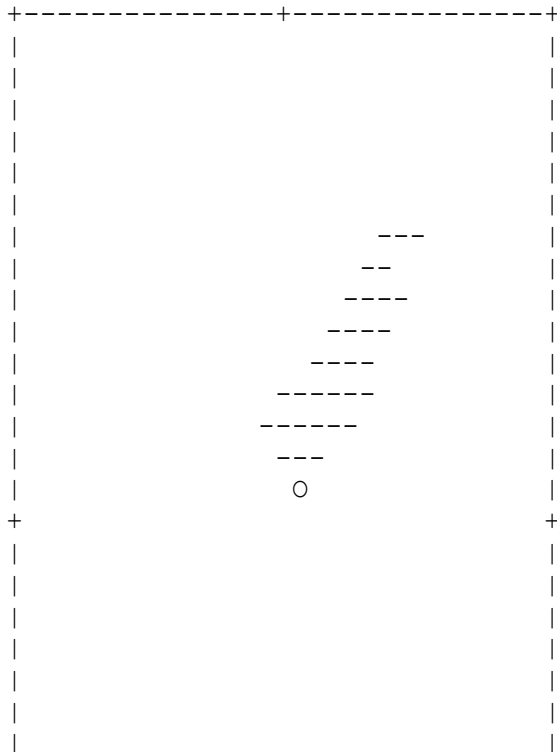
Total		389							

Total allotments, least preclusive spacing: 12
 Total allotments, most preclusive spacing: 8
 Atlantic City, NJ Atlantic City, NJ
 Latitude 39-21-51 Latitude 39-21-51

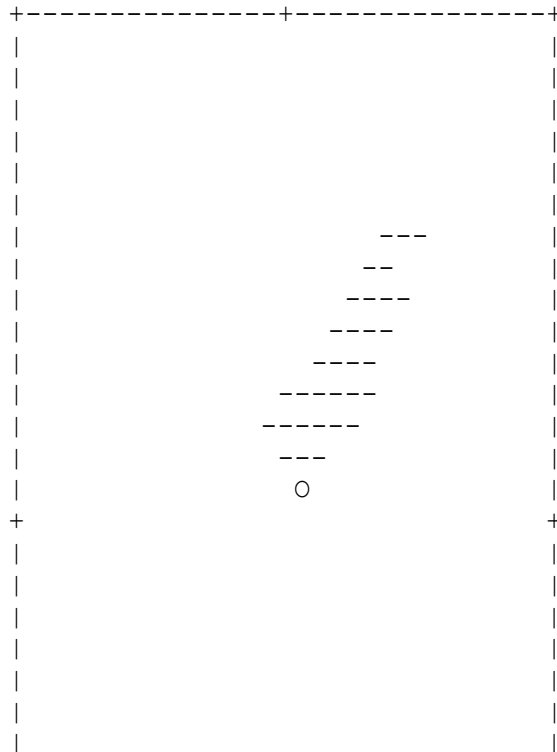
A large rectangular area defined by dashed lines. At each of the four corners, there is a small crosshair symbol (+). In the top right corner of this area, there is a small cluster of horizontal dashes: a top row of three dashes, a second row of two dashes, a third row of three dashes, a fourth row of two dashes, a fifth row of one dash, and a sixth row of one dash.

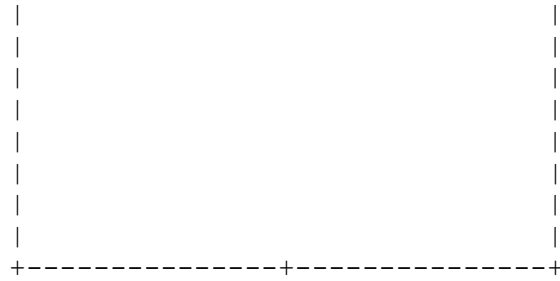


Point #093 at 39-36-51 074-12-24
Atlantic City, NJ
Latitude 39-21-51
Longitude 074-25-24
Least preclusive siting
Availability of Channel 250 (X)

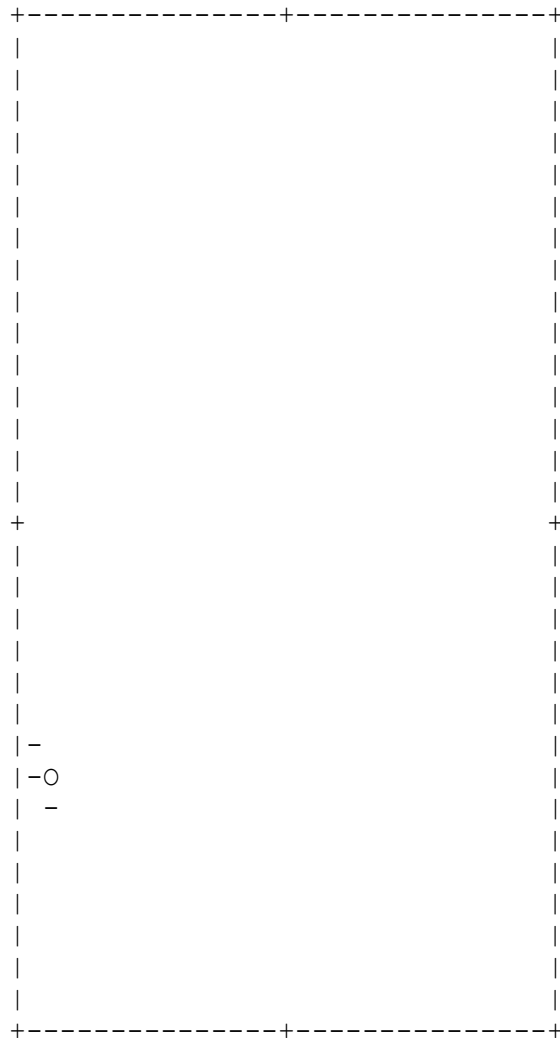


Point #093 at 39-36-51 074-12-24
Atlantic City, NJ
Latitude 39-21-51
Longitude 074-25-24
Most preclusive siting
Availability of Channel 250 (X)

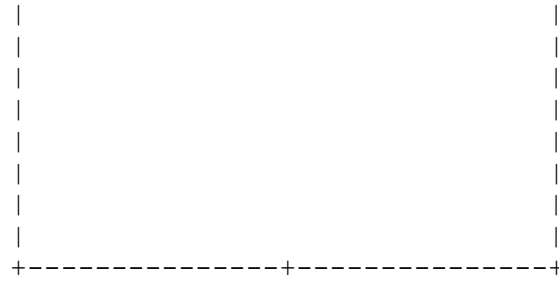




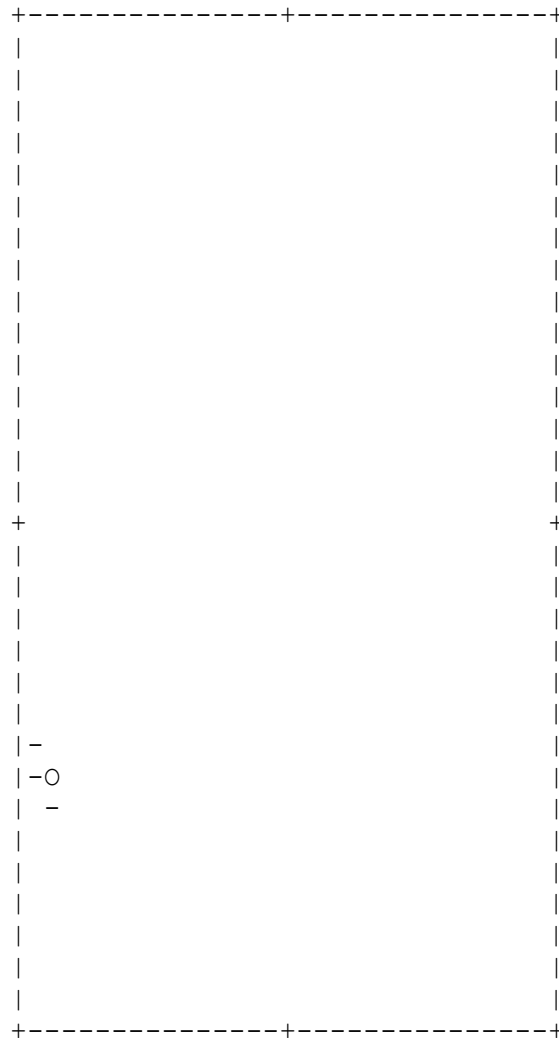
Point #451 at 39-22-51 074-24-24
Atlantic City, NJ
Latitude 39-21-51
Longitude 074-25-24
Least preclusive siting
Availability of Channel 261 (X)



Point #907 at 39-13-51 074-39-24
Atlantic City, NJ



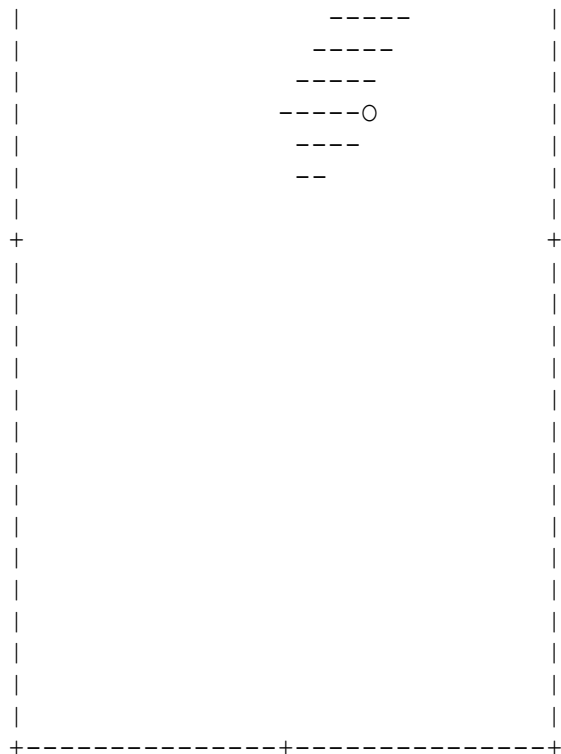
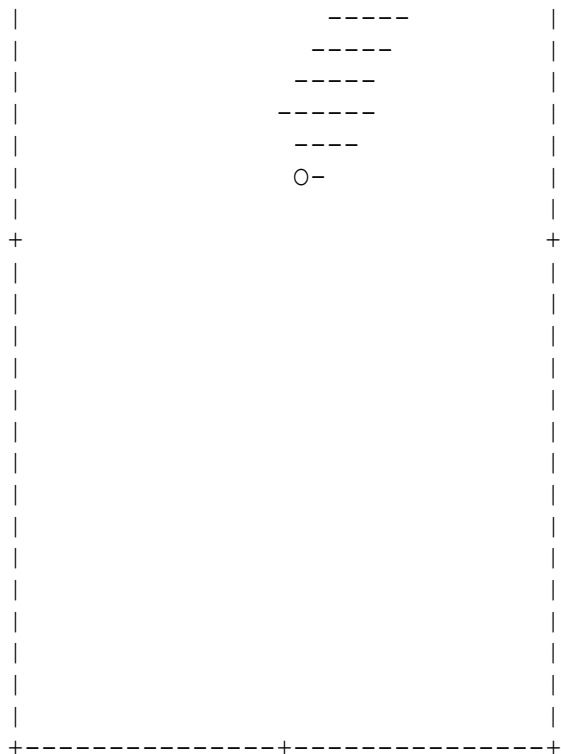
Point #451 at 39-22-51 074-24-24
Atlantic City, NJ
Latitude 39-21-51
Longitude 074-25-24
Most preclusive siting
Availability of Channel 261 (X)



Point #907 at 39-13-51 074-39-24
Atlantic City, NJ

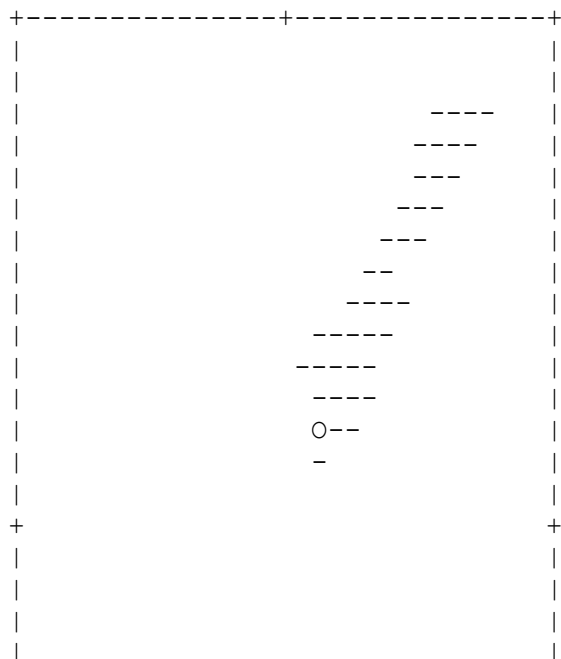
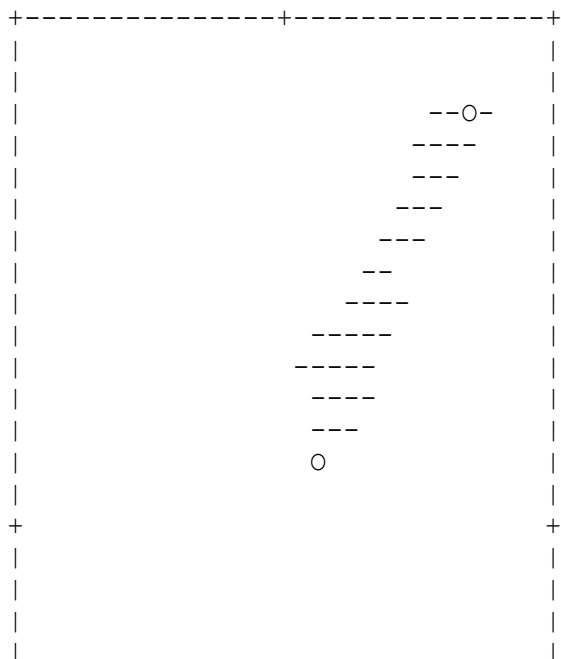
A diagram showing a rectangular frame with dashed lines and tick marks at the corners. Inside the frame, there is a small circle with a horizontal line segment to its right, and a horizontal dashed line segment above it.

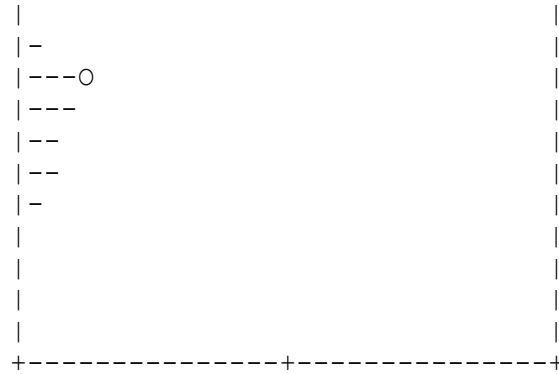
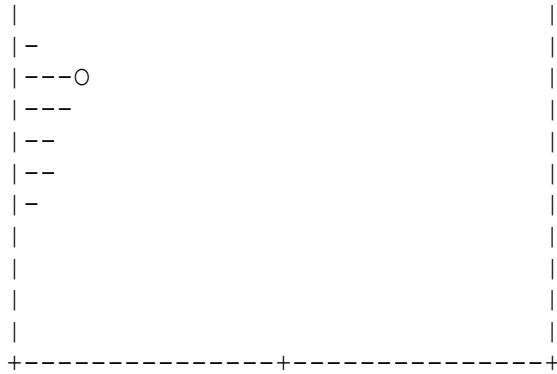
A diagram showing a rectangular frame with dashed lines and tick marks at the corners. Inside the frame, there is a small circle with a horizontal line segment to its right, and a horizontal dashed line segment above it.



Point #093 at 39-36-51 074-12-24
 Point #452 at 39-23-51 074-24-24
 Atlantic City, NJ
 Latitude 39-21-51
 Longitude 074-25-24
 Least preclusive siting
 Availability of Channel 282 (X)

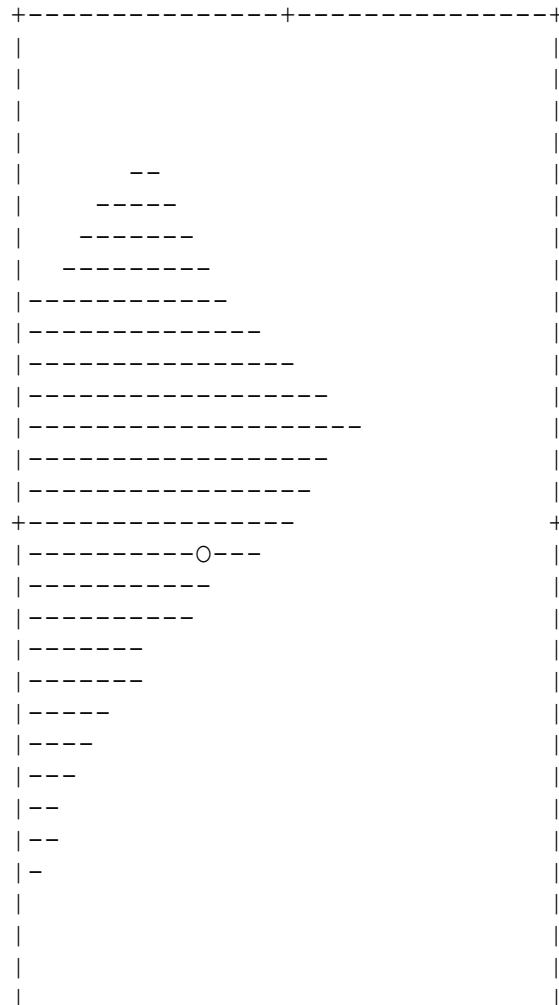
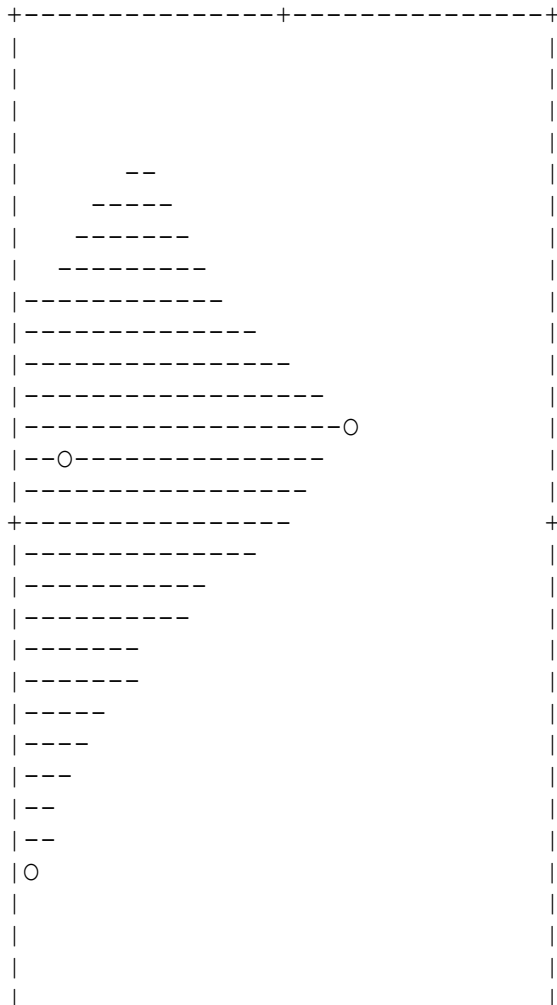
Point #330 at 39-25-51 074-20-24
 Atlantic City, NJ
 Latitude 39-21-51
 Longitude 074-25-24
 Most preclusive siting
 Availability of Channel 282 (X)





Point #846 at 39-14-51 074-37-24
Point #421 at 39-23-51 074-23-24
Point #153 at 39-34-51 074-14-24
Atlantic City, NJ
Latitude 39-21-51
Longitude 074-25-24
Least preclusive siting
Availability of Channel 300 (X)

Point #422 at 39-24-51 074-23-24
Point #846 at 39-14-51 074-37-24
Atlantic City, NJ
Latitude 39-21-51
Longitude 074-25-24
Most preclusive siting
Availability of Channel 300 (X)



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+-----+-----+

Point #935 at 39-10-51 074-40-24
Point #360 at 39-24-51 074-21-24
Point #886 at 39-23-51 074-38-24

Point #635 at 39-20-51 074-30-24

{End of Figure 2}

FIGURE 3

Cherry Hill, NJ
 Latitude 39-51-33
 Longitude 074-56-51
 Grid Size 11 x 11
 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	0	263	0	283	0
204	0	224	0	244	0	264	0	284	0
205	0	225	121	245	0	265	0	285	0
206	0	226	0	246	0	266	0	286	0
207	0	227	0	247	0	267	0	287	0
208	0	228	0	248	0	268	0	288	0
209	0	229	0	249	0	269	0	289	0
210	0	230	0	250	0	270	0	290	0
211	0	231	0	251	0	271	0	291	0
212	0	232	0	252	0	272	0	292	0
213	0	233	0	253	2	273	0	293	1
214	0	234	0	254	0	274	0	294	0
215	0	235	0	255	0	275	0	295	0
216	0	236	0	256	0	276	0	296	0
217	0	237	0	257	0	277	0	297	0
218	0	238	0	258	0	278	0	298	0
219	0	239	0	259	0	279	0	299	0
								300	0

Total	124								

Total allotments, least preclusive spacing: 3
 Total allotments, most preclusive spacing: 3
 Cherry Hill, NJ
 Latitude 39-51-33

Cherry Hill, NJ
 Latitude 39-51-33

Longitude 074-56-51
Least preclusive siting
Availability of Channel 225 (X)

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Longitude 074-56-51
Most preclusive siting
Availability of Channel 225 (X)

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Point #061 at 39-51-33 074-56-51
Cherry Hill, NJ
Latitude 39-51-33
Longitude 074-56-51
Least preclusive siting
Availability of Channel 253 (X)

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+-----+-----+
| -      |
| O      |
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```

Point #061 at 39-51-33 074-56-51
Cherry Hill, NJ
Latitude 39-51-33
Longitude 074-56-51
Most preclusive siting
Availability of Channel 253 (X)

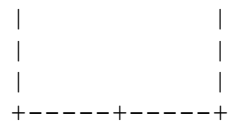
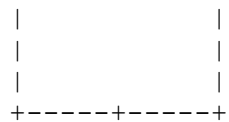
```
+-----+-----+
| -      |
| O      |
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+-----+-----+
```

Point #120 at 39-55-33 075-01-51
Cherry Hill, NJ
Latitude 39-51-33
Longitude 074-56-51
Least preclusive siting
Availability of Channel 293 (X)

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+-----+-----+
| O      |
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|        |
|        |
```

Point #120 at 39-55-33 075-01-51
Cherry Hill, NJ
Latitude 39-51-33
Longitude 074-56-51
Most preclusive siting
Availability of Channel 293 (X)

```
+-----+-----+
| O      |
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+       +
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|        |
```



Point #121 at 39-56-33 075-01-51

Point #121 at 39-56-33 075-01-51

{End of Figure 3}