

Figure 1

**K217CL - MINOR CHANGE TO LICENSED FACILITY (250-mile window application)**  
**Demonstration of 60 dBu contour within lesser of 2 mV or 25-mile radius of KEYY (AM)**

Table 1

MINOR CHANGE TO LICENSED FACILITY (250-mile window application): Proposed Channel 217

## Channel Study

| Chan | Class | Call Letters | Type | Status | City            | State | Country | Owner                   | Distance<br>(km) | Bearing TO<br>(deg) | Req. Dist.<br>(km) | Clearance<br>(km) | Field<br>Strength<br>(dBu) |             |
|------|-------|--------------|------|--------|-----------------|-------|---------|-------------------------|------------------|---------------------|--------------------|-------------------|----------------------------|-------------|
| 215  | C     | KRCL         | FM   | LIC    | SALT LAKE CITY  | UT    | US      | LISTENERS COMMUNITY R/  | 62.01            | 310.32              | 90.41              | -28.403           | 71.1                       | (see NOTE)  |
| 215  | D     | KRCL-FM1     | FB   | LIC    | PARK CITY       | UT    | US      | LISTENERS COMMUNITY R/  | 63.16            | 12.4                | 28.75              | 34.413            |                            |             |
| 217  | D     | K217CL       | FX   | LIC    | PROVO           | UT    | US      | YOUR CHRISTIAN COMPAN   | 24.95            | 264.46              | 84.58              | -59.63            |                            | (applicant) |
| 217  | D     | K217FQ       | FX   | LIC    | CENTERVILLE     | UT    | US      | BIBLE BROADCASTING NET  | 60.17            | 339.72              | 33.38              | 26.788            |                            |             |
| 218  | D     | K218EM       | FX   | LIC    | HEBER CITY      | UT    | US      | UNIVERSITY OF UTAH      | 32.36            | 25.73               | 11.41              | 20.946            |                            |             |
| 219  | A     | KOHS         | FM   | CP     | OREM            | UT    | US      | ALPINE SCHOOL DISTRICT  | 0.22             | 260.43              | 8.12               | -7.909            | 100.0                      | (see NOTE)  |
| 219  | A     | NEW          | FM   | APP    | OREM            | UT    | US      | R B SCHOOLS             | 0.24             | 268.8               | 6.74               | -6.505            | 97.5                       | (see NOTE)  |
| 219  | A     | KOHS         | FM   | LIC    | OREM            | UT    | US      | ALPINE SCHOOL DISTRICT  | 3.63             | 255.62              | 12.74              | -9.105            | 80.0                       | (see NOTE)  |
| 219  | A     | KPCW         | FM   | CP     | PARK CITY       | UT    | US      | COMMUNITY WIRELESS OF   | 43.68            | 13.28               | 11.43              | 32.259            |                            |             |
| 219  | A     | KUFR         | FM   | LIC    | SALT LAKE CITY  | UT    | US      | FAMILY STATIONS, INC.   | 56.06            | 338.4               | 12.09              | 43.972            |                            |             |
| 220  | D     | K220AY       | FX   | LIC    | HEBER CITY, ETC | UT    | US      | COMMUNITY WIRELESS OF   | 29.81            | 39.6                | 8.95               | 20.867            |                            |             |
| 220  | A     | KPCW         | FM   | LIC    | PARK CITY       | UT    | US      | COMMUNITY WIRELESS OF   | 43.68            | 13.28               | 8.2                | 35.488            |                            |             |
| 270  | C     | KHTB         | FM   | LIC    | OGDEN           | UT    | US      | RADIO LICENSE HOLDING C | 62.01            | 310.32              | 29                 | 33.009            |                            |             |

## NOTE:

(No interference CAUSED to KRCL, KOHS, and "NEW(FM)") Of the three 2nd adjacent facilities, KRCL has the lowest field strength of 71.1 dBu at the proposed site. Therefore, the "worst case" potential interference is the 111.1 dBu F(50,10) contour. At 250 watts ERP, using a Shively 6812B-1 antenna, the proposed translator's 111.1 dBu F(50,10) extends 313 meters horizontally from the antenna. The closest structure is approximately 190 meters from the proposed antenna and is located at lower elevation (38 meters below the horizontal plane of the antenna). **Beyond 134 meters distance, the 111.1 dBu contour does not extend more than 10 meters below the horizontal plane of the antenna.** Therefore, the interfering contour does not reach any occupied structures or population. Therefore this proposal is compliant with the allowance of Rule 74.1204(d). (See Figure 2)

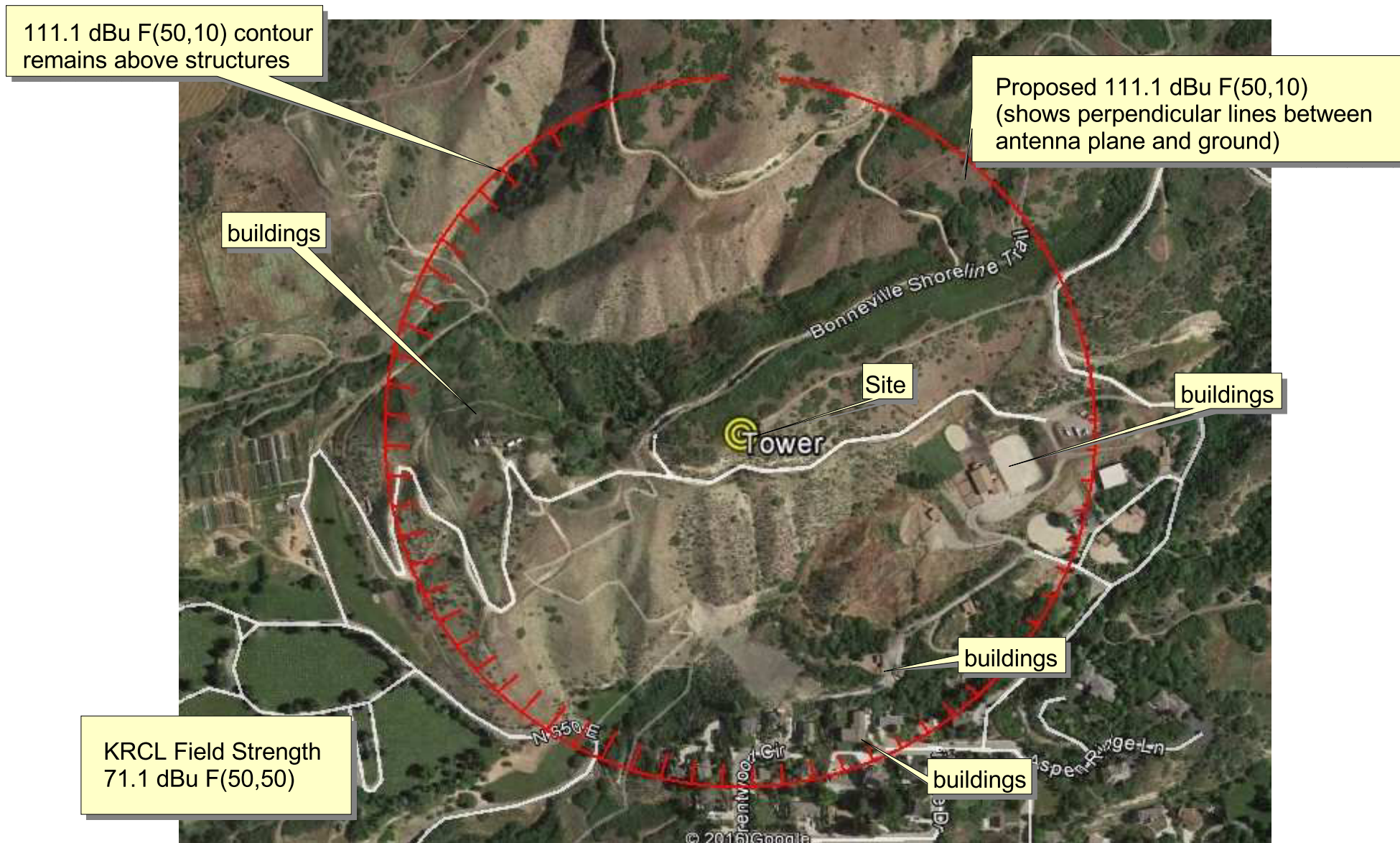
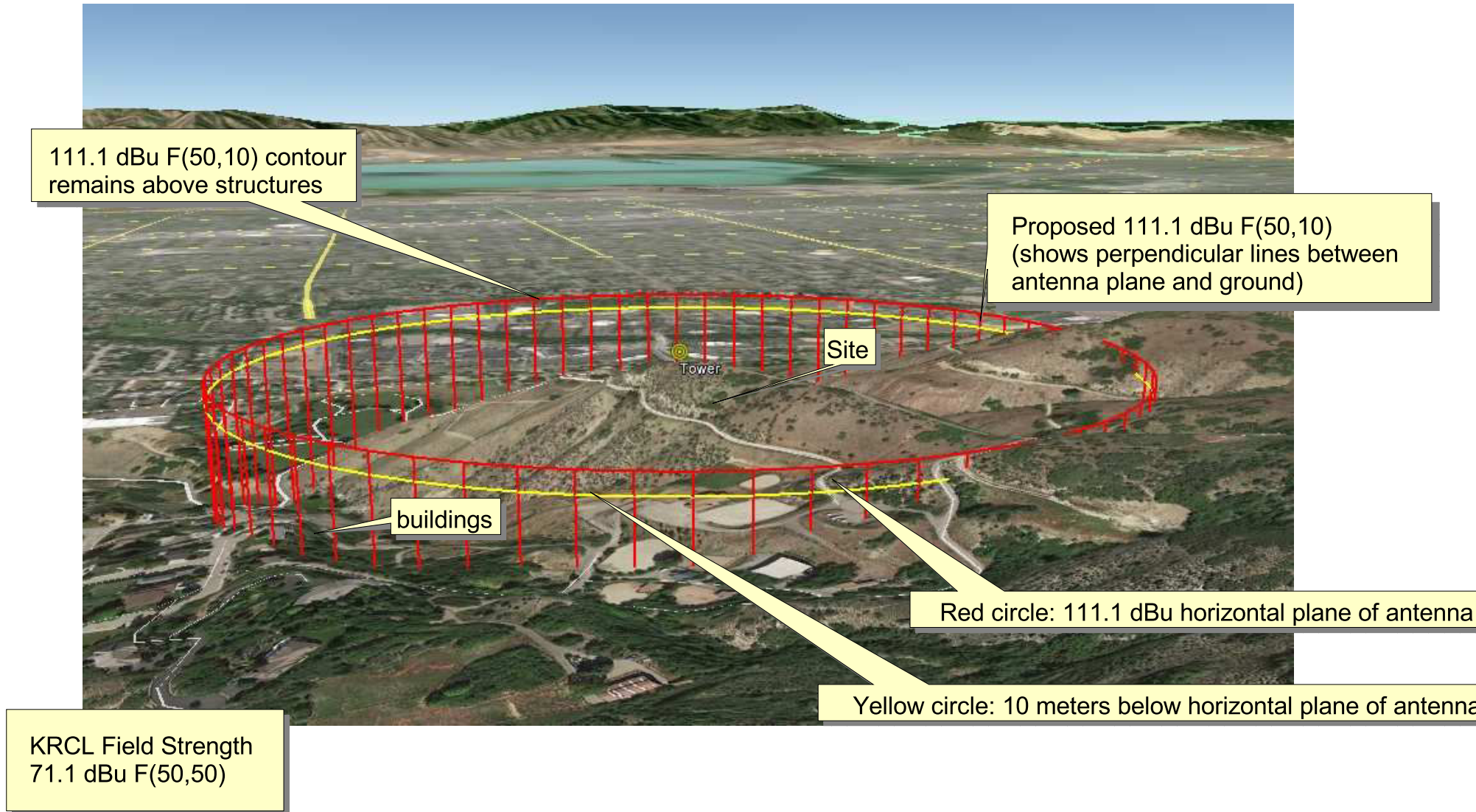


Figure 2-A

**K217CL , PROVO, UT: MINOR CHANGE TO A LICENSED FACILITY**  
**2nd adjacent channel study with respect to KRCL**



("side view")



**Figure 2-B**

**K217CL , PROVO, UT: MINOR CHANGE TO A LICENSED FACILITY  
2nd adjacent channel study with respect to KRCL**

("above angle view")

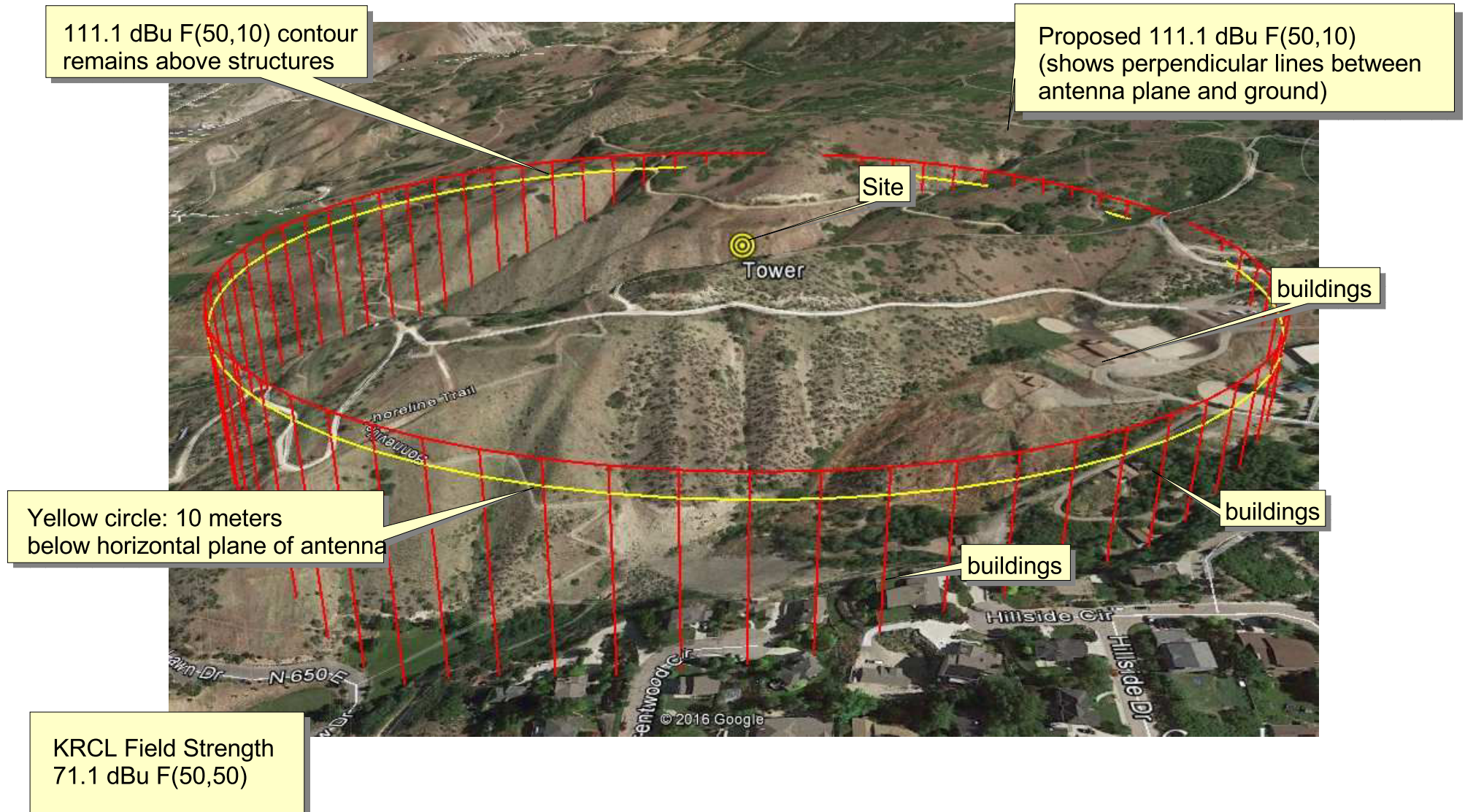


Figure 2-C

**K217CL , PROVO, UT: MINOR CHANGE TO A LICENSED FACILITY**  
**2nd adjacent channel study with respect to KRCL**



## Radiofrequency Electromagnetic Exposure Analysis

| Source          | Height<br>AGL(m) | Antenna type | Bays | Horizontal<br>ERP (kw) | Vertical<br>ERP<br>(kw) | <b>Power Density <math>\mu\text{W}/\text{cm}^2</math> at 2 meters AGL</b> |  |         |   |                                  |
|-----------------|------------------|--------------|------|------------------------|-------------------------|---|--|---------|---|----------------------------------|
|                 |                  |              |      |                        |                         | within 10<br>meters<br>distance   | % controlled<br>environment limit<br>(1000 $\mu\text{W}/\text{cm}^2$ ) | Max. PD | % uncontrolled<br>environment limit<br>(200 $\mu\text{W}/\text{cm}^2$ ) | Distance to<br>maximum PD<br>(m) |
| PROPOSED K217CL | 7                | SHI 6812B-1  | 1    | 0.250                  | 0.250                   | 142.40  | 14.2%  | 142.40  | 71.2%   | 5.2                              |
|                 |                  |              |      |                        |                         | 142.40  | <b>14.2%</b>   | 142.40  | <b>71.2%</b>  | 5.2                              |

The proposed facility is excluded from environmental processing under 47. C.F.R. Section 1.1306 (i.e., The facility will not have a significant environmental impact and complies with the maximum permissible radiofrequency electromagnetic exposure limits for controlled and uncontrolled environments).

Calculations made using FCC FM Model v2.10 Beta