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FCC FORM 301, EXHIBIT 44
ENVIRONMENTAL ASSESSMENT
APPLICATION FOR MODIFICATION OF
CONSTRUCTION PERMIT
PREPARED FOR
CHRISTIAN COMMUNICATIONS OF CHICAGOLAND
STATION KTLN-DT NOVATO, CALIFORNIA
CH 47 1000 KW (MAX-DA, BT) 402 METERS

This engineering exhibit was prepared on behalf of Christian Communications of Chicagoland, (hereinafter CCC) permittee of station KTLN-DT, Novato, California, in support of an FCC Form 301 minor change of an authorized facility. The instant application requests modification of the KTLN-DT antenna. No other changes to the KTLN-DT authorized parameters are requested.

KTLN-DT is authorized (FCC File Number BPCDT-19991026ABE) to operate on channel 47 (668 to 674 megahertz (MHz)) with maximum average effective radiated power (ERP) of 1000 kilowatts (kW), horizontally polarized, and antenna radiation center height above average terrain (HAAT) of 402 meters and 11 meters above ground level (AGL). The authorized KTLN-DT site is located at

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geographic coordinates 38° 09' 00" North Latitude, 122° 35' 31" West Longitude, referenced to the 1927 North American Datum (NAD 27).

Public access to the communications site in which the KTLN-DT antenna and supporting structure are located is limited by an exterior chain link fence topped with barbed wire. Public access to the KTLN-DT antenna and supporting structure is restricted further by a locked gate leading to the site. Only authorized personnel are permitted within the enclosed area.

ENVIRONMENTAL ANALYSIS

KTLN-DT, NOVATO, CALIFORNIA

An analysis has been made of the human exposure to RFR using the calculation methodology described in *OET Bulletin 65, Edition 97-01*, prepared by the FCC Office of Engineering and technology. A conservative vertical plane relative field factor of 0.04, obtained from the manufacturer's theoretical vertical plane radiation pattern for the KTLN-DT RF Technologies, type SFN-2050-F-16, transmitting antenna, was used in the calculation of the KTLN-DT power density. The KTLN-DT horizontally polarized maximum average ERP of 1000 kW was used

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in the calculation of the KTLN-DT power density. To account for ground reflections, a coefficient of 1.6 was included in the calculation.

At the KTLN-DT lower edge operating frequency of 668 MHz, the FCC MPE level for general population/uncontrolled exposure is 0.45 milliwatt per square centimeter (mW/cm^2), and the FCC MPE level for occupational/controlled exposure is $2.23 \text{ mW}/\text{cm}^2$. At a reference point two meters above ground level at the base of the existing tower, the calculated KTLN-DT power density is $0.21 \text{ mW}/\text{cm}^2$, which is 46.7 percent of the FCC MPE level for general population/uncontrolled exposures and 9.4 percent of the FCC MPE level for occupational/controlled exposures.

Pursuant to the provisions of *OET Bulletin 65, edition 97-01*, only those licensees whose transmitters produce power density levels in excess of 5.0 percent of the applicable exposure limit are considered “significant contributors” and are responsible for actions necessary to bring the local RFR environment into compliance with FCC exposure limits. Since the calculated power density indicates that the KTLN-DT operation may contribute more than 5.0 percent of the maximum permissible exposure limit for general/uncontrolled exposure at the

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reference point, KTLN-DT may be a “significant contributor” to the local RF exposure environment, and KTLN-DT will make exposure measurements prior to beginning program test.

The KTLN-DT operation is also a “significant contributor” to exposure at locations on the supporting structure near the energized KTLN-DT transmitting antenna. If work is done on the tower in an area where overexposure could occur, CCC will take action necessary to prevent the overexposure of workers on the tower, including reducing KTLN-DT transmitter power or ceasing KTLN-DT operation completely.

The instant proposal is categorically excluded from environmental processing since none of the conditions of Sections 1.1306(b)(1), (2), or (3) of the FCC Rules would be involved for the following reasons:

1. The KTLN-DT facility utilizes an existing supporting structure.

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2. The provision of Section 1.1306(b)(2) of the FCC Rules relating to the use of strobe lighting does not apply since high-intensity strobe lighting will not be used.

3. Finally, with regard to RFR exposure concerns, the instant proposal complies with applicable FCC MPE limits.

CERTIFICATION

I declare under penalty of perjury that the foregoing is true and correct to the best of my knowledge. Executed on April 14, 2006.



Tiffany E. Ligon