



ENGINEERING STUDY
LICENSE MODIFICATION APPLICATION
K207FA

TECHNICAL STATEMENT

This technical statement and attached exhibits were prepared on behalf of Santa Monica Community College District, licensee of translator K207FA, Facility ID #83662, translator for station KCRI, 89.3MHz, Indio, CA. Facility ID #59087. This application seeks to modify the currently licensed facility by reducing the antenna height at essentially the same coordinates due to overcrowding of the tower. The antenna will be relocated to a pole on the transmitter building. The proposed coverage and interfering contours will all be within the same contours of the currently licensed facility.

Facilities Proposed

Location (NAD83)	34° 09' 15.1" N Latitude, 116° 11' 52.7" W Longitude
Channel	207D (89.3 MHz)
Tower Overall AGL Height-	9m
Tower ASR	N/A (mounted to pole on building)
Proposed Antenna	Shively 6812-1 (no change)
Antenna AGL Height-	8.4m
Site AMSL Height-	913m
Maximum HAAT	294.2m @ 90° T (max power limited to 10w)
MERP	10 Watts-NON-DIRECTIONAL

COMPLIANCE WITH 74.1204(a) [contour overlap]

The modified translator on channel 207D will be fully compliant with 74.1204(a). A table showing the allocation is attached as Exhibit A and a map depicting the closest pertinent facilities is attached as Exhibit B.

COMPLIANCE WITH 74.1235(b)(1)

This facility is considered "Other than fill-in service". As such, the MERP must be considered pursuant to 74.1235(b)(1). The Maximum HAAT is found along the 90-degree radial and is 294m HAAT. Because this is over 141m, as specified in this section the maximum power (MERP) of the nondirectional antenna will be limited to 10 watts.

COMPLIANCE WITH 74.1204(d) [2nd & 3rd Adjacent Interference]

The proposed translator 100dBu f50,10 contour does not intersect the protected contour of any second or third adjacent station.

COMPLIANCE WITH 74.1201(g) [Noncommercial Translator], 74.1233(a) [Minor Change]

K207FA will continue to operate in the noncommercial reserved band in accordance with 74.1201(g). The proposed translator will serve some portion of the existing licensed K207FA 60dBu service area in accordance with 74.1233(a). A comparison of contours is shown in Exhibit C.

ENVIRONMENTAL EXHIBIT

The proposed translator facility will utilize a non-directional antenna located on a pole attached to a building on a ridge overlooking the community being served.

The RF density near the tower was calculated using an EPA Type 1 "Ring and Stub" antenna setting at 10 watts vertical + horizontal, using the proposed Shively 6812-1 antenna at 8.4m AGL.

Using the FCC program "FM Model for Windows", it was calculated that the proposed antenna contributes approximately $9.8\mu\text{W}/\text{cm}^2$ or 4.9 % of the total allowable $200\mu\text{W}/\text{cm}^2$. The maximum was found to be 1.8 meters from the base of pole attachment. There are no tall buildings within 500m of the proposed tower.

Based upon the above evaluation, the proposed antenna will not cause the RF density at the tower site to exceed public exposure limits and contributes less than 5% of the MPE at ground level. Based upon the preceding, this proposed facility is excluded from further Environmental Assessment under 47CFR 1.1306 and 1.1307.

The proposed new FM translator along with other users at the site will maintain an occupational safety policy and agrees to reduce power or cease operation during periods of maintenance to avoid potentially harmful exposure of personnel to non-ionizing RF radiation.

Respectfully Submitted

A handwritten signature in cursive script, appearing to read "Bert Goldman". The signature is written in black ink and is positioned above the printed name and title.

Bert Goldman
Technical Consultant

EXHIBIT A- ALLOCATION STUDY

ComStudy 2.2 search of channel 207 (89.3 MHz Class D) at 34-09-15.1 N, 116-11-52.7 W.

CALL	CITY	ST CHN CL	DIST	SEP	BRNG	CLEARANCE
K205DK	YUCCA VALLEY	CA 205 D	15.60	0.00	239.0	0.51 dB Exhibit B
K210EN	JOSHUA TREE	CA 210 D	17.68	0.00	269.6	10.48 dB
KCRI	INDIO	CA 207 B1	39.19	0.00	183.6	13.69 dB Exhibit B
KUOR-FM	REDLANDS	CA 206 A	78.67	0.00	273.7	24.37 dB
KSDW	TEMECULA	CA 205 B	110.69	0.00	218.2	27.52 dB
KLXD	VICTORVILLE	CA 208 B1	112.76	0.00	297.2	30.27 dB
KUBO	CALEXICO	CA 204 B	136.77	0.00	165.9	32.94 dB
KODV	BARSTOW	CA 206 B	119.08	0.00	319.9	32.40 dB

LMS AS OF 5/18/2020

EXHIBIT B Pertinent Protection Contours

K207FA Licensed (30m AGL) Vs. Proposed (8.4m AGL)- Allocation Contours

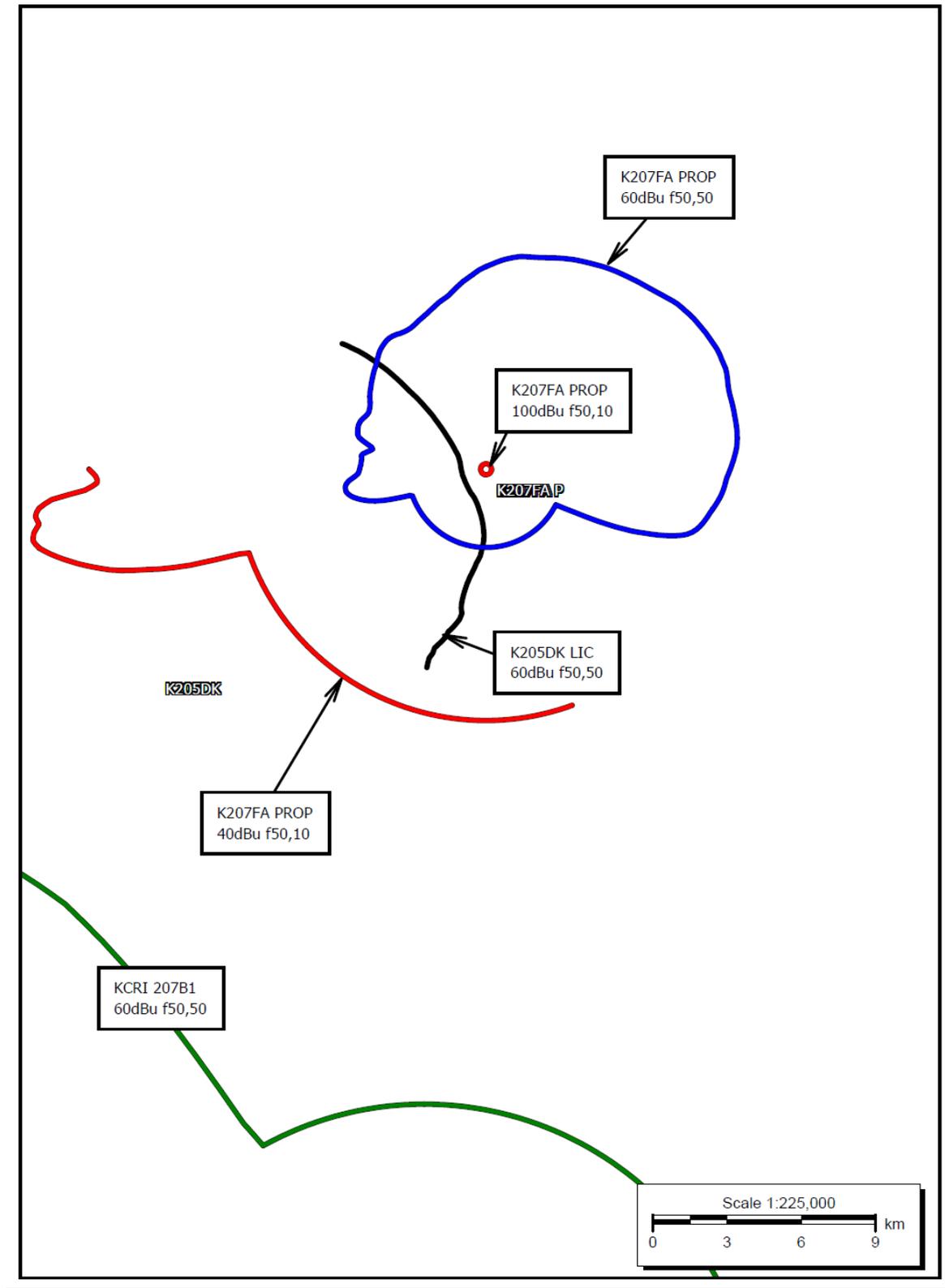


EXHIBIT C, Contour Comparison

K207FA Licensed (30m AGL) Vs. Proposed (8.4m AGL)

