

## ARRANGEMENT K

### SHARING ARRANGEMENT BETWEEN THE DEPARTMENT OF INDUSTRY OF CANADA AND THE FEDERAL COMMUNICATIONS COMMISSION OF THE UNITED STATES OF AMERICA CONCERNING THE USE OF THE FREQUENCY BAND 1427 - 1432 MHz BY TELEMETRY SYSTEMS AND SUBSCRIBER RADIO SYSTEMS IN THE FIXED SERVICE ALONG THE CANADA-UNITED STATES BORDER

The Department of Industry of Canada ("Industry Canada") and the Federal Communications Commission of the United States of America ("FCC"), hereinafter referred to as the "Agencies",

Have agreed to the following:

#### 1. Scope

- 1.1 This Arrangement is done pursuant to the *Exchange of Notes (October 24, 1962) between the Government of Canada and the Government of the United States of America concerning the coordination and use of radio frequencies above thirty megacycles per second*, with annex, done at Ottawa October 24, 1962, as amended, and covers the sharing and coordination of frequency spectrum for the establishment and operation of subscriber radio systems ("SRS") in the fixed service and telemetry ("TEL") systems in the band 1427-1432 MHz along the United States-Canada border.
- 1.2 This Arrangement is subject to review at any time at the request of either Agency, the U.S. Department of State or the Department of Foreign Affairs and International Trade of Canada.

#### 2. General Principles

- 2.1 The Agencies shall share the frequency band 1427-1432 MHz on an equal basis along the border and, to the extent possible, the Agencies shall have full use of these frequencies or sub-bands for the provision of TEL and SRS within their respective countries.
- 2.2 The Agencies shall require that TEL and SRS licensees in the frequency band 1427-1432 MHz carry out coordination for their respective service areas on both sides of the border in accordance with Section 4 of this Arrangement.
- 2.3 The Agencies shall encourage TEL and SRS licensees to enter into agreements with licensees on the other side of the border. These agreements are intended to facilitate coordination and allow for the reasonable and timely development of the respective systems of the licensees. These agreements also allow for the provision of services by each licensee within its licensed service area to the extent possible.
- 2.4 The Agencies shall encourage licensees that enter into agreements under section 2.3 above to take full advantage of interference mitigation techniques such as antenna directivity, polarization, frequency offset, shielding, site selection and/or power control to facilitate the coordination of the licensees' systems.

- 2.5 The Agencies shall provide all data and calculations for determining compliance with this Arrangement upon request by the other Agency.
- 2.6 If a licence for operation in the frequency band 1427-1432 MHz is transferred, assigned or reissued, the Agencies shall require any existing agreement that formed the basis of coordination in the border area to continue to apply with respect to the new licensee unless a new agreement is reached.
- 2.7 In certain exceptional circumstances, the Agencies may agree to special coordination allowing variation(s) in technical conditions in this Arrangement through an exchange of correspondence.

### **3. Wireless Medical Telemetry Service (“WMTS”)**

- 3.1 Frequency coordination between Canadian and United States WMTS operators is not required.

### **4. Cross-Border Coordination of Telemetry and Subscriber Radio Systems**

- 4.1 This Section of the Arrangement covers coordination of base stations (central transmitting stations) and their associated subscriber stations of both TEL and SRS systems located on either side of the United States-Canada border. Those stations shall be referred to respectively as TEL and SRS station(s).
- 4.2 Coordination of a TEL or SRS station shall be required if: (a) it is located at a distance less than 90 km from the United States-Canada border; and (b) the power flux-density (pfd) produced by the station at ground level anywhere in the other country’s territory exceeds  $-116 \text{ dBW/m}^2$  in any 1 MHz bandwidth.

Notwithstanding clauses (a) and (b) above, coordination shall not be required for cases covered under section 4.6 below. In addition, coordination shall only be required between licensees whose assigned frequency channels overlap.

- 4.3 When coordination is required, the Agencies shall ensure that the following process is applied:
  - 4.3.1 The licensee seeking coordination shall determine the maximum pfd value that could be produced at and beyond the border by any single transmitting station of the system. In making this determination (calculation), the licensee shall use good engineering practice and generally accepted terrain-sensitive propagation models.
  - 4.3.2 A licensee establishing a TEL or SRS station shall contact all other licensees in the other country with a licensed area within 90 km of the transmitting TEL or SRS station;

4.3.3 It shall be the responsibility of the licensee seeking coordination to communicate with licensees on the other side of the border, by registered mail (or other mutually acceptable method) providing a clear indication of when coordination was initiated;

4.3.4 A recipient of a coordination request shall respond by registered mail (or other mutually acceptable method) within 45 days of receipt to state any objection to deployment of the proposed TEL or SRS station. The date of postmark shall be taken as the date of response. If no objection is raised within that time frame, then the licensee initiating the coordination request may proceed with deployment of the proposed TEL or SRS station;

4.3.5 If a recipient of a coordination request raises an objection within 45 days of receipt of that request, licensees shall collaborate to develop a mutually acceptable solution to the potential interference problem;

4.3.6 In the event that licensees cannot reach a mutually acceptable solution within 45 days of a receipt of an objection, either licensee may request its Agency to facilitate a resolution of the case with the other Agency. A station subject to coordination shall not be placed in operation either until an agreement has been reached between the relevant licensees or until the Agencies have agreed on sharing terms; and

4.3.7 In cases where there is no licensee on the opposite side of the border, any TEL or SRS station within 90 km of the Canada-U.S. border shall not produce a pfd at or beyond the border that exceeds  $-116 \text{ dBW/m}^2$  in any 1 MHz bandwidth, unless agreed to by the Agencies.

4.4 The Agencies shall require that licensees coordinate using the process described above if modifications to any of their TEL or SRS stations subject to coordination would result in a pfd at or beyond the border that exceeds  $-116 \text{ dBW/m}^2$  in any 1 MHz bandwidth.

4.5 Provided the frequency pairing is dissimilar on opposite sides of the border (i.e. a TEL/SRS licensee in one country is paired with WMTS on the other side of the border), a TEL or SRS station operating in the region of Windsor, in Canada, or Detroit, in the United States shall not be required to coordinate, but shall under no circumstances exceed a pfd level of  $-102 \text{ dBW/m}^2$  in any 1 MHz bandwidth in the territory of the other country in order to protect WMTS systems where Canadian and United States band plans do not align. This region is defined as Oakland, Wayne, Washtenaw, Macomb and Livingston Counties in Michigan in the United States and Essex County, Ontario in Canada.

4.6 Notwithstanding Section 4 above, a TEL or SRS system licensed prior to the entry into force of this Arrangement may continue to operate in the frequency range 1427-1432 MHz using its currently authorized parameters.

**5. Information exchange**

- 5.1 To facilitate the coordination required under this Arrangement, the Agencies shall exchange information including, but not limited to either: (1) licensee name(s); (2) licensed service areas; and (3) licensee point(s) of contact; or shall provide to one another alternative means to obtain that information.
- 5.2 Where necessary, the Agencies shall provide information to their respective licensees to facilitate licensee-to-licensee coordination required under this Arrangement.
- 5.3 To facilitate cross-border coordination between licensees, the Agencies shall encourage licensees to exchange the data listed in Annex A to this Arrangement.

## **Annex A - Parameters for Coordination**

Licensee information (Corporate name/Mailing address/Phone/Fax/Email address)

Location of transmitter (Community/State/Province)

Geographical coordinates of transmitting antenna (NAD 83)

Equivalent Isotropic Radiated Power (EIRP) (dBW)

Ground elevation and antenna height above ground (m)

Center frequency (MHz)

Antenna pattern/tabulation of the pattern

Azimuth of the maximum antenna gain

Bandwidth and emission designation(s)

