

Vår ref./Our ref.:
96/7870-541

Vår dato/Our date:
30.9.96

Deres ref./Your ref.:
Hk 96-54777

Deres dato/Your date:
1996-09-26

Post & Telestyrelsen
P. O.Box 5398
102 49 STOCKHOLM

Vår saksbehandler:
T. J. Botheim



COORDINATION AGREEMENT 1800 MHZ

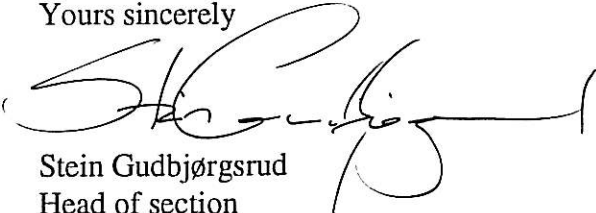
Please find enclosed the signed coordination agreement concerning the frequency bands 1710 - 1785 MHz and 1805 - 1880 MHz.

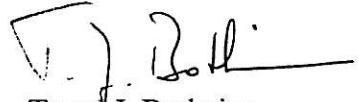
The agreement is reached with the understanding that

- a) the possible other systems referred to in 2.1 operate in accordance with the Radio Regulations and that the field strength limits may not be applicable to emissions from systems with other channelling arrangements.
- b) the characteristics of operation of the aeronautical mobile system referred to in 2.3 are in conformity with the description in the technical report by Telia 18 May 1995, used for the preparation of this agreement.

This interpretation was agreed by fax the 30 September 1996.

Yours sincerely


Stein Gudbjørgrud
Head of section


Trond J. Botheim

1996-07-17
DCS_NO.WPD
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**Agreement between
the Norwegian Telecommunications Authority, Norway and
the National Post and Telecom Agency, Sweden
concerning the use of the frequency bands
1710-1785/1805-1880 MHz**

1996

Agreement between the Norwegian Telecommunications Authority, Norway and the National Post and Telecom Agency, Sweden concerning the use of the frequency bands 1710-1785 / 1805-1880 MHz

Section 1 - Use of channels from 1 October 1996

- 1.1 Norway may use its preferential channels without coordination with Sweden, if the field strength of every single carrier produced by a base station does not exceed 42 dBuV/m at the Swedish coastline or border or at Kosteröarna.
- 1.2 Sweden may use its preferential channels without coordination with Norway, if the field strength of every single carrier produced by a base station does not exceed 42 dBuV/m at the Norwegian coastline or border or at Hvaleröarna.
- 1.3 Norway may use its non-preferential channels without coordination with Sweden, if the field strength of every single carrier produced by a base station does not exceed 25 dBuV/m at the Swedish coastline or border or at Kosteröarna.
- 1.4 Sweden may use its non-preferential channels without coordination with Norway, if the field strength of every single carrier produced by a base station does not exceed 25 dBuV/m at the Norwegian coastline or border or at Hvaleröarna.

Section 2 - General

- 2.1 If a country use part of the frequency band for other purposes than DCS-1800, the limits of this agreement shall still apply.
- 2.2 A field strength exceeding above mentioned levels shall be coordinated with the other country, except for the system in 2.3.
- 2.3 Sweden may use its aeronautical mobile system on the frequency 1811,5 MHz without coordination. Technical data in accordance with annex 2.
- 2.4 Preliminary coordination may take place between the operators concerned. The results from preliminary coordination between operators must be approved by the administrations.

- 2.5 The above mentioned field strength values are to be calculated at a receiving antenna height of 1,5 m and for 50 % of time and 50 % of locations.
- 2.6 A complaint in case of interference shall be based on the median values of measurements of field strength performed at least on two different occasions over a range of at least 100 m of the tangent of the wave propagation of an interfering base station. Measurements of field strength shall refer to the coastline.

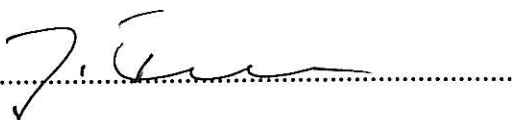
Section 3 - Revision

- 3.1 This agreement may be revised or cancelled as desired by one of the administrations with a notice of one year.
- 3.2 If no agreement is reached then, CEPT Recommendation T/R 22-07 shall apply.
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This agreement has been drawn up in two identical copies, one for Norway and one for Sweden.

Stockholm, 26 September 1996

Oslo, 30 September 1996

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Annex 1
Assignment of preferential frequencies between Norway and Sweden

Frequencyband 1710 - 1785 / 1805 - 1880 MHz
 From 1 October 1996

channel #	frequency (MHz)	frequency (MHz)	preference channels
512	1710,200	1805,200	Norway
513	1710,400	1805,400	Norway
514	1710,600	1805,600	Norway
515	1710,800	1805,800	Norway
516	1711,000	1806,000	Norway
517	1711,200	1806,200	Norway
518	1711,400	1806,400	Norway
519	1711,600	1806,600	Norway
520	1711,800	1806,800	Norway
521	1712,000	1807,000	Norway
522	1712,200	1807,200	Norway
523	1712,400	1807,400	Norway
524	1712,600	1807,600	Sweden
525	1712,800	1807,800	Sweden
526	1713,000	1808,000	Sweden
527	1713,200	1808,200	Sweden
528	1713,400	1808,400	Sweden
529	1713,600	1808,600	Sweden
530	1713,800	1808,800	Sweden
531	1714,000	1809,000	Sweden
532	1714,200	1809,200	Sweden
533	1714,400	1809,400	Sweden
534	1714,600	1809,600	Sweden
535	1714,800	1809,800	Sweden
536	1715,000	1810,000	Norway
537	1715,200	1810,200	Norway
538	1715,400	1810,400	Norway
539	1715,600	1810,600	Norway
540	1715,800	1810,800	Norway
541	1716,000	1811,000	Norway
542	1716,200	1811,200	Norway
543	1716,400	1811,400	Norway
544	1716,600	1811,600	Norway
545	1716,800	1811,800	Norway
546	1717,000	1812,000	Norway
547	1717,200	1812,200	Norway
548	1717,400	1812,400	Sweden
549	1717,600	1812,600	Sweden
550	1717,800	1812,800	Sweden
551	1718,000	1813,000	Sweden
552	1718,200	1813,200	Sweden
553	1718,400	1813,400	Sweden
554	1718,600	1813,600	Sweden
555	1718,800	1813,800	Sweden
556	1719,000	1814,000	Sweden
557	1719,200	1814,200	Sweden
558	1719,400	1814,400	Sweden
559	1719,600	1814,600	Sweden
560	1719,800	1814,800	Norway
561	1720,000	1815,000	Norway
562	1720,200	1815,200	Norway
563	1720,400	1815,400	Norway
564	1720,600	1815,600	Norway
565	1720,800	1815,800	Norway
566	1721,000	1816,000	Norway
567	1721,200	1816,200	Norway
568	1721,400	1816,400	Norway
569	1721,600	1816,600	Norway
570	1721,800	1816,800	Norway
571	1722,000	1817,000	Norway

572	1722,200	1817,200	Sweden
573	1722,400	1817,400	Sweden
574	1722,600	1817,600	Sweden
575	1722,800	1817,800	Sweden
576	1723,000	1818,000	Sweden
577	1723,200	1818,200	Sweden
578	1723,400	1818,400	Sweden
579	1723,600	1818,600	Sweden
580	1723,800	1818,800	Sweden
581	1724,000	1819,000	Sweden
582	1724,200	1819,200	Sweden
583	1724,400	1819,400	Sweden
584	1724,600	1819,600	Norway
585	1724,800	1819,800	Norway
586	1725,000	1820,000	Norway
587	1725,200	1820,200	Norway
588	1725,400	1820,400	Norway
589	1725,600	1820,600	Norway
590	1725,800	1820,800	Norway
591	1726,000	1821,000	Norway
592	1726,200	1821,200	Norway
593	1726,400	1821,400	Norway
594	1726,600	1821,600	Norway
595	1726,800	1821,800	Norway
596	1727,000	1822,000	Sweden
597	1727,200	1822,200	Sweden
598	1727,400	1822,400	Sweden
599	1727,600	1822,600	Sweden
600	1727,800	1822,800	Sweden
601	1728,000	1823,000	Sweden
602	1728,200	1823,200	Sweden
603	1728,400	1823,400	Sweden
604	1728,600	1823,600	Sweden
605	1728,800	1823,800	Sweden
606	1729,000	1824,000	Sweden
607	1729,200	1824,200	Sweden
608	1729,400	1824,400	Norway
609	1729,600	1824,600	Norway
610	1729,800	1824,800	Norway
611	1730,000	1825,000	Norway
612	1730,200	1825,200	Norway
613	1730,400	1825,400	Norway
614	1730,600	1825,600	Norway
615	1730,800	1825,800	Norway
616	1731,000	1826,000	Norway
617	1731,200	1826,200	Norway
618	1731,400	1826,400	Norway
619	1731,600	1826,600	Norway
620	1731,800	1826,800	Sweden
621	1732,000	1827,000	Sweden
622	1732,200	1827,200	Sweden
623	1732,400	1827,400	Sweden
624	1732,600	1827,600	Sweden
625	1732,800	1827,800	Sweden
626	1733,000	1828,000	Sweden
627	1733,200	1828,200	Sweden
628	1733,400	1828,400	Sweden
629	1733,600	1828,600	Sweden
630	1733,800	1828,800	Sweden
631	1734,000	1829,000	Sweden
632	1734,200	1829,200	Norway
633	1734,400	1829,400	Norway
634	1734,600	1829,600	Norway
635	1734,800	1829,800	Norway
636	1735,000	1830,000	Norway
637	1735,200	1830,200	Norway
638	1735,400	1830,400	Norway
639	1735,600	1830,600	Norway
640	1735,800	1830,800	Norway
641	1736,000	1831,000	Norway

642	1736,200	1831,200	Norway
643	1736,400	1831,400	Norway
644	1736,600	1831,600	Sweden
645	1736,800	1831,800	Sweden
646	1737,000	1832,000	Sweden
647	1737,200	1832,200	Sweden
648	1737,400	1832,400	Sweden
649	1737,600	1832,600	Sweden
650	1737,800	1832,800	Sweden
651	1738,000	1833,000	Sweden
652	1738,200	1833,200	Sweden
653	1738,400	1833,400	Sweden
654	1738,600	1833,600	Sweden
655	1738,800	1833,800	Sweden
656	1739,000	1834,000	Norway
657	1739,200	1834,200	Norway
658	1739,400	1834,400	Norway
659	1739,600	1834,600	Norway
660	1739,800	1834,800	Norway
661	1740,000	1835,000	Norway
662	1740,200	1835,200	Norway
663	1740,400	1835,400	Norway
664	1740,600	1835,600	Norway
665	1740,800	1835,800	Norway
666	1741,000	1836,000	Norway
667	1741,200	1836,200	Norway
668	1741,400	1836,400	Sweden
669	1741,600	1836,600	Sweden
670	1741,800	1836,800	Sweden
671	1742,000	1837,000	Sweden
672	1742,200	1837,200	Sweden
673	1742,400	1837,400	Sweden
674	1742,600	1837,600	Sweden
675	1742,800	1837,800	Sweden
676	1743,000	1838,000	Sweden
677	1743,200	1838,200	Sweden
678	1743,400	1838,400	Sweden
679	1743,600	1838,600	Sweden
680	1743,800	1838,800	Norway
681	1744,000	1839,000	Norway
682	1744,200	1839,200	Norway
683	1744,400	1839,400	Norway
684	1744,600	1839,600	Norway
685	1744,800	1839,800	Norway
686	1745,000	1840,000	Norway
687	1745,200	1840,200	Norway
688	1745,400	1840,400	Norway
689	1745,600	1840,600	Norway
690	1745,800	1840,800	Norway
691	1746,000	1841,000	Norway
692	1746,200	1841,200	Sweden
693	1746,400	1841,400	Sweden
694	1746,600	1841,600	Sweden
695	1746,800	1841,800	Sweden
696	1747,000	1842,000	Sweden
697	1747,200	1842,200	Sweden
698	1747,400	1842,400	Sweden
699	1747,600	1842,600	Sweden
700	1747,800	1842,800	Sweden
701	1748,000	1843,000	Sweden
702	1748,200	1843,200	Sweden
703	1748,400	1843,400	Sweden
704	1748,600	1843,600	Norway
705	1748,800	1843,800	Norway
706	1749,000	1844,000	Norway
707	1749,200	1844,200	Norway
708	1749,400	1844,400	Norway
709	1749,600	1844,600	Norway
710	1749,800	1844,800	Norway
711	1750,000	1845,000	Norway

712	1750,200	1845,200	Norway
713	1750,400	1845,400	Norway
714	1750,600	1845,600	Norway
715	1750,800	1845,800	Norway
716	1751,000	1846,000	Sweden
717	1751,200	1846,200	Sweden
718	1751,400	1846,400	Sweden
719	1751,600	1846,600	Sweden
720	1751,800	1846,800	Sweden
721	1752,000	1847,000	Sweden
722	1752,200	1847,200	Sweden
723	1752,400	1847,400	Sweden
724	1752,600	1847,600	Sweden
725	1752,800	1847,800	Sweden
726	1753,000	1848,000	Sweden
727	1753,200	1848,200	Sweden
728	1753,400	1848,400	Norway
729	1753,600	1848,600	Norway
730	1753,800	1848,800	Norway
731	1754,000	1849,000	Norway
732	1754,200	1849,200	Norway
733	1754,400	1849,400	Norway
734	1754,600	1849,600	Norway
735	1754,800	1849,800	Norway
736	1755,000	1850,000	Norway
737	1755,200	1850,200	Norway
738	1755,400	1850,400	Norway
739	1755,600	1850,600	Norway
740	1755,800	1850,800	Sweden
741	1756,000	1851,000	Sweden
742	1756,200	1851,200	Sweden
743	1756,400	1851,400	Sweden
744	1756,600	1851,600	Sweden
745	1756,800	1851,800	Sweden
746	1757,000	1852,000	Sweden
747	1757,200	1852,200	Sweden
748	1757,400	1852,400	Sweden
749	1757,600	1852,600	Sweden
750	1757,800	1852,800	Sweden
751	1758,000	1853,000	Sweden
752	1758,200	1853,200	Norway
753	1758,400	1853,400	Norway
754	1758,600	1853,600	Norway
755	1758,800	1853,800	Norway
756	1759,000	1854,000	Norway
757	1759,200	1854,200	Norway
758	1759,400	1854,400	Norway
759	1759,600	1854,600	Norway
760	1759,800	1854,800	Norway
761	1760,000	1855,000	Norway
762	1760,200	1855,200	Norway
763	1760,400	1855,400	Norway
764	1760,600	1855,600	Sweden
765	1760,800	1855,800	Sweden
766	1761,000	1856,000	Sweden
767	1761,200	1856,200	Sweden
768	1761,400	1856,400	Sweden
769	1761,600	1856,600	Sweden
770	1761,800	1856,800	Sweden
771	1762,000	1857,000	Sweden
772	1762,200	1857,200	Sweden
773	1762,400	1857,400	Sweden
774	1762,600	1857,600	Sweden
775	1762,800	1857,800	Sweden
776	1763,000	1858,000	Norway
777	1763,200	1858,200	Norway
778	1763,400	1858,400	Norway
779	1763,600	1858,600	Norway
780	1763,800	1858,800	Norway
781	1764,000	1859,000	Norway

782	1764,200	1859,200	Norway
783	1764,400	1859,400	Norway
784	1764,600	1859,600	Norway
785	1764,800	1859,800	Norway
786	1765,000	1860,000	Norway
787	1765,200	1860,200	Norway
788	1765,400	1860,400	Sweden
789	1765,600	1860,600	Sweden
790	1765,800	1860,800	Sweden
791	1766,000	1861,000	Sweden
792	1766,200	1861,200	Sweden
793	1766,400	1861,400	Sweden
794	1766,600	1861,600	Sweden
795	1766,800	1861,800	Sweden
796	1767,000	1862,000	Sweden
797	1767,200	1862,200	Sweden
798	1767,400	1862,400	Sweden
799	1767,600	1862,600	Sweden
800	1767,800	1862,800	Norway
801	1768,000	1863,000	Norway
802	1768,200	1863,200	Norway
803	1768,400	1863,400	Norway
804	1768,600	1863,600	Norway
805	1768,800	1863,800	Norway
806	1769,000	1864,000	Norway
807	1769,200	1864,200	Norway
808	1769,400	1864,400	Norway
809	1769,600	1864,600	Norway
810	1769,800	1864,800	Norway
811	1770,000	1865,000	Norway
812	1770,200	1865,200	Sweden
813	1770,400	1865,400	Sweden
814	1770,600	1865,600	Sweden
815	1770,800	1865,800	Sweden
816	1771,000	1866,000	Sweden
817	1771,200	1866,200	Sweden
818	1771,400	1866,400	Sweden
819	1771,600	1866,600	Sweden
820	1771,800	1866,800	Sweden
821	1772,000	1867,000	Sweden
822	1772,200	1867,200	Sweden
823	1772,400	1867,400	Sweden
824	1772,600	1867,600	Norway
825	1772,800	1867,800	Norway
826	1773,000	1868,000	Norway
827	1773,200	1868,200	Norway
828	1773,400	1868,400	Norway
829	1773,600	1868,600	Norway
830	1773,800	1868,800	Norway
831	1774,000	1869,000	Norway
832	1774,200	1869,200	Norway
833	1774,400	1869,400	Norway
834	1774,600	1869,600	Norway
835	1774,800	1869,800	Norway
836	1775,000	1870,000	Sweden
837	1775,200	1870,200	Sweden
838	1775,400	1870,400	Sweden
839	1775,600	1870,600	Sweden
840	1775,800	1870,800	Sweden
841	1776,000	1871,000	Sweden
842	1776,200	1871,200	Sweden
843	1776,400	1871,400	Sweden
844	1776,600	1871,600	Sweden
845	1776,800	1871,800	Sweden
846	1777,000	1872,000	Sweden
847	1777,200	1872,200	Sweden
848	1777,400	1872,400	Norway
849	1777,600	1872,600	Norway
850	1777,800	1872,800	Norway
851	1778,000	1873,000	Norway

852	1778,200	1873,200	Norway
853	1778,400	1873,400	Norway
854	1778,600	1873,600	Norway
855	1778,800	1873,800	Norway
856	1779,000	1874,000	Norway
857	1779,200	1874,200	Norway
858	1779,400	1874,400	Norway
859	1779,600	1874,600	Norway
860	1779,800	1874,800	Sweden
861	1780,000	1875,000	Sweden
862	1780,200	1875,200	Sweden
863	1780,400	1875,400	Sweden
864	1780,600	1875,600	Sweden
865	1780,800	1875,800	Sweden
866	1781,000	1876,000	Sweden
867	1781,200	1876,200	Sweden
868	1781,400	1876,400	Sweden
869	1781,600	1876,600	Sweden
870	1781,800	1876,800	Sweden
871	1782,000	1877,000	Sweden
872	1782,200	1877,200	
873	1782,400	1877,400	
874	1782,600	1877,600	
875	1782,800	1877,800	
876	1783,000	1878,000	
877	1783,200	1878,200	
878	1783,400	1878,400	
879	1783,600	1878,600	
880	1783,800	1878,800	
881	1784,000	1879,000	
882	1784,200	1879,200	
883	1784,400	1879,400	
884	1784,600	1879,600	
885	1784,800	1879,800	

Technical data for the Swedish IFF-system

Transmitting station - Aircraft

Frequency 1811,5 MHz

Peak power max 64 dBm

Pulse characteristics

Width 0,6 uS

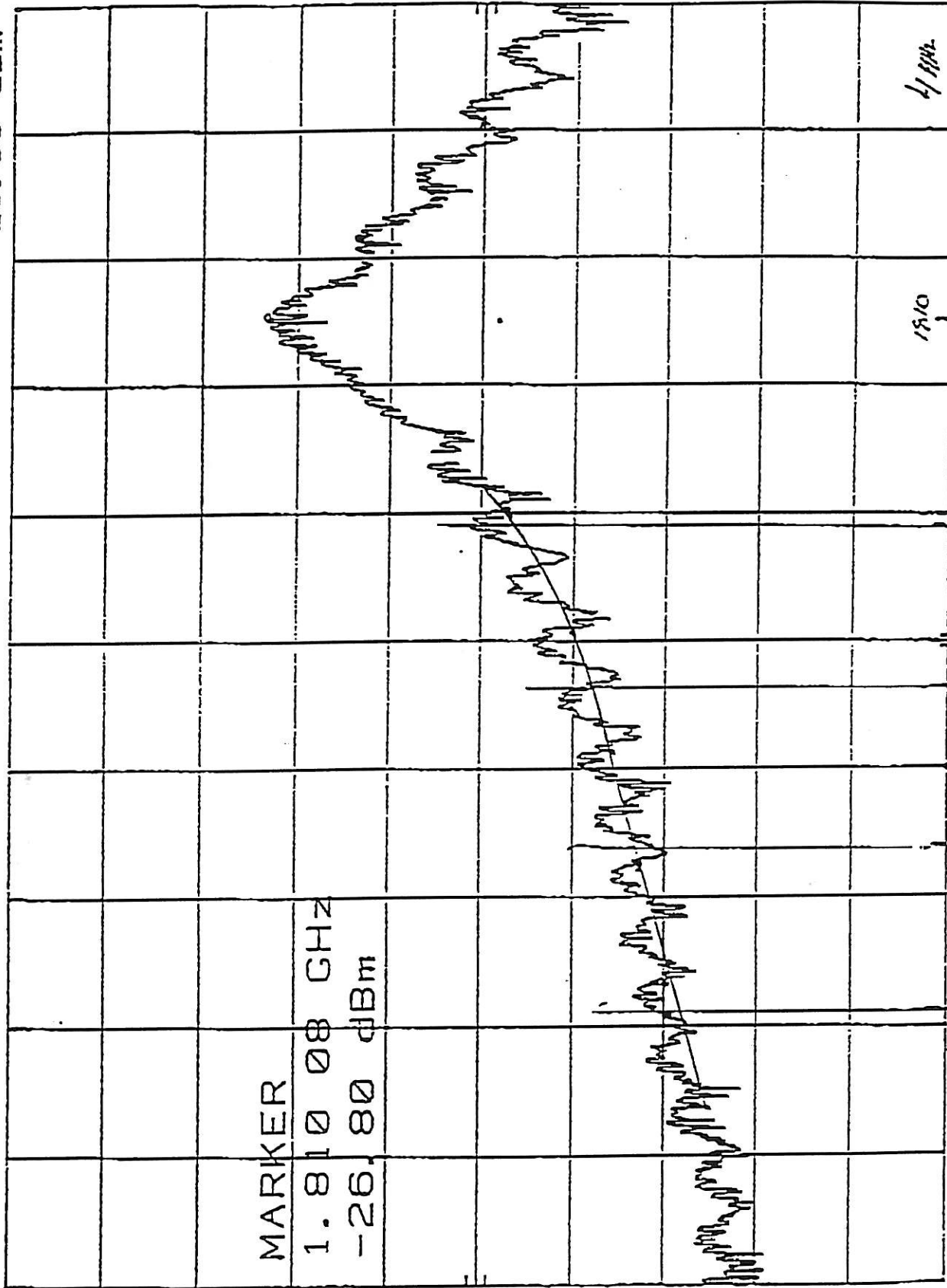
Transponder reply 4 pulses within 12 uS

Transponder reply frequency max ca 500 pulse trains/sec

Transmitter spectrum Appendix 1

HP REF 0.0 dBm A.TEN 10 dB MKR 1.810 08 GHz -26.80 dBm

10 dB/



START 1.780 0 GHz RES BW 30 kHz VBW 100 kHz STOP 1.820 0 GHz SWP 120 msec