

## RECOMMENDATION ITU-R M.1178\*

**USE OF THE MARITIME RADIONAVIGATION BAND  
(283.5-315 kHz IN REGION 1 AND 285-325 kHz  
IN REGIONS 2 AND 3)**

(Question ITU-R 203/8)

(1995)

**Summary**

The ITU-R has carried out initial studies of the technical factors, bandwidth, modulation method, protection ratios and sharing criteria of maritime radionavigation systems, including the transmission of differential corrections for Global Navigation Satellite Systems (GNSS), that could coexist with maritime radiobeacons without degrading radiobeacon operations.

This Recommendation describes where the necessary information can be found to ensure compatible operation, in this frequency band, of radiobeacons, differential transmissions for GNSS and a hyperbolic maritime radionavigation system. It also recommends that more efficient use could be made of the band by allowing the transmission of maritime navigational information, using narrow-band techniques from stations other than radiobeacons.

The ITU Radiocommunication Assembly,

*considering*

- a) Resolution No. 602 (Mob-87) (Data transmissions from maritime radiobeacons for differential radionavigation systems) of the World Administrative Radio Conference for the Mobile Services (Geneva, 1987);
- b) the technical characteristics set in the Final Acts of the Regional Administrative Conference for the Planning of the Maritime Radionavigation Service (radiobeacons) in the European Maritime Area (Geneva, 1985);
- c) the studies which were carried out by the ITU-R on the sharing and protection criteria of continuous data transmissions and hyperbolic radionavigation systems in order to ensure compatibility with radiobeacons;
- d) the decreasing requirements for maritime radiobeacons and the increasing requirements for differential GNSS,

*recommends*

- 1** that the provisions of Recommendation ITU-R M.823, in particular the protection ratios, be applied to differential transmissions to facilitate coexistence with radiobeacons;
- 2** that the provisions of Recommendation ITU-R M.631, in particular the protection ratios, be applied to hyperbolic maritime radionavigation systems to facilitate coexistence with radiobeacons;
- 3** that, to permit more efficient use of the band, regulatory arrangements should be made to allow for the transmission of maritime navigational information using narrow-band techniques from stations other than radiobeacons.

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\* This Recommendation should be brought to the attention of the International Maritime Organization (IMO), the International Civil Aviation Organization (ICAO) and the International Association of Lighthouse Authorities (IALA).