

Statement

of Opinion

No.: 142140133/AA/00

With respect to Chapter 10 of the Telecommunications Act of The Netherlands, Telefication declares that to our opinion the listed product complies with the essential requirements, in accordance with Article 3 of the Directive 1999/5/EC, as indicated under Annex 1 of this statement.

Product description: **Compact Dual Polarimetric X-band Doppler Weather Radar**
Trademark: **FURUNO**
Family name: --
Type designation: **WR-2100**
Serial No: --
Hard-/Software release No: --

Manufacturer: **Furuno Electric Co., Ltd.**
Address: **9-52 Ashihara cho**
City: **662-8580 Nishinomiya**
Country: **Japan**

This statement is granted to:

Name: **Furuno Electric Co., Ltd.**
Address: **9-52 Ashihara cho**
City: **662-8580 Nishinomiya**
Country: **Japan**

This statement has THREE Annexes.

Zevenaar, 04 June 2014



W.J.M. Jong
Manager Product Certification



For each product to which this Statement of Opinion relates (see annex 3) our opinion with respect to the essential requirements is as follows:

Article 3.1

- C (a) The protection of the health and safety of the user and other person, including the objectives with respect to safety requirements contained in Directive 73/23/EEC^{*)}, but with no voltage limit applying.
- C (b) The protection requirements with respect to electromagnetic compatibility contained in Directive 89/336/EEC^{*)}.

^{*)} In addition standards published under Directives 2006/95/EC, 2004/108/EC, 90/385/EEC and 93/42/EEC may have been used to demonstrate compliance with articles 3.1.a and 3.1.b of Directive 1999/5/EC.

Article 3.2

- C The radio product shall be so constructed that it effectively uses the spectrum allocated to terrestrial/space radio communication and orbital resources so as to avoid harmful interference.

Article 3.3

- NA (a) The product shall be so constructed that it interworks via networks with other apparatus and that it can be connected to interfaces of the appropriate type throughout the Community.
- NA (b) The product shall be so constructed that it does not harm the network or its functioning nor misuse network resources, thereby causing an unacceptable degradation of service.
- NA (c) The product shall be so constructed that it incorporates safeguards to ensure that the personal data and privacy of the user and of the subscriber are protected.
- NA (d) The product shall be so constructed that it supports certain features ensuring avoidance of fraud.
- NA (e) The product shall be so constructed that it supports certain features ensuring access to emergency services.
- NA (f) The product shall be so constructed that it supports certain features in order to facilitate its use by users with a disability.

Opinions

- C = Conform
- NC = Not Conform
- NA = Not applicable (for this product)
- NP = Not performed (in this statement)

- The validity of this Statement of Opinion is limited to products, which are equal to the one examined in the type-examination.
- When the manufacturer (or holder of this statement) is placing the product on the European market or the countries of the EEA, the marking of this product must contain (among other elements) the Notified Body number of Telefication: 0560
- This Statement of Opinion does not imply that the product can be used in the European Union or the countries of the EEA. If the product can not be identified as 'class-1' in accordance with Commission Decision 2000/299/EC, then:
 - Placing the product on the market may be subject to notification to the national radio agencies.
 - Putting the product into service is subject to national frequency regulation and may require licencing.

Remarks and observations

The following conditions are applicable:

The radar equipment consists of the following equipment or units:

Signal Processing unit: WR-2100-SPU

Antenna unit: WR-2100-ATU

Antenna: Radome with dish-antenna/cassegrain.

RF exposure safety distance: 5.9m (10W/m²).

Antenna and signal processing unit are waterproof according to IPX5.

Documentation lodged for this Statement of Opinion*Test Reports:*

- Furuno Labotech International Co. Ltd.: FLI 12-14-004, 20 March 2014
- Furuno Labotech International Co. Ltd.: FLI 12-14-005, 20 March 2014
- Furuno Labotech International Co. Ltd.: FLI 12-14-006, 20 March 2014
- Furuno Labotech International Co. Ltd.: FLI 12-14-008, 20 March 2014
- Furuno Labotech International Co. Ltd.: FLI 12-14-010, 20 March 2014
- Furuno Labotech International Co. Ltd.: FLI 12-14-011, 20 March 2014
- Furuno Labotech International Co. Ltd.: FLI 12-14-018, 25 March 2014

Product Documentation:

- Assembly drawings
- Bill of materials
- Block diagram
- Electric diagrams
- Photos
- User manual
- Installation manual

Technical Standards and Specifications

The following standards have been used in full or part to cover the essential requirements:

- EN 302 248: November, 2013, V1.2.1
- EN 60945: October, 2002, Edition 4
- EN 60950-1: 2006
- EN 60950-1/A1: March, 2010
- EN 60950-1/A2: August, 2013
- EN 62311: January, 2008
- IEC 60945/Corrigendum 1: April, 2008, Edition 4
- IEC 61000-6-4: February, 2011, Ed. 2.1
- ITU-R M.1177-4: April, 2011
- ITU-R SM.1539-1: November, 2002
- ITU-R SM.1541-4: September, 2011
- ITU-R SM.329-11: January, 2011

Technical features and characteristics

The product includes the following features and characteristics:

Weather Radar:

- Operating frequency range: 9470 MHz
- Modulation method(s): P0N; Q0N; V0N
- Maximum output power: 100W rated
- Maximum antenna gain: 33 dBi

The product as described in this Statement of Opinion includes the following type designations:

- Product description: Compact Dual Polarimetric X-band Doppler Weather Radar
- Trademark: FURUNO
- Type Designation: WR-2100