

Deviation Request ETSO-C115d#1 for an ETSO approval for CS-ETSO applicable to the REQUIRED NAVIGATION PERFORMANCE (RNP) EQUIPMENT USING MULTI-SENSOR INPUTS (ETSO-C115d) Consultation Paper

1 Introductory Note

The hereby presented deviation requests shall be subject to public consultation, in accordance with EASA Management Board Decision No 7-2004 as amended by EASA Management Board [Decision No 12-2007](#) products certification procedure dated 11th September 2007, Article 3 (2.) of which states:

“2. Deviations from the applicable airworthiness codes, environmental protection certification specifications and/or acceptable means of compliance with Part 21, as well as important special conditions and equivalent safety findings, shall be submitted to the panel of experts and be subject to a public consultation of at least 3 weeks, except if they have been previously agreed and published in the Official Publication of the Agency. The final decision shall be published in the Official Publication of the Agency.”

2 ETSO-C115d#1 REQUIRED NAVIGATION PERFORMANCE (RNP) EQUIPMENT USING MULTI-SENSOR INPUTS

2.1 Summary of Deviation

Deviates from RTCA DO-283B section 2.2.1.2.12.2 by not supporting the item c. “RNP coded in the navigation data base for the area”.

2.2 Original Requirement

Excerpt from RTCA / DO-283B

2.2.1.2.12.2 RNP Associated with a Flight Plan Leg:

The equipment shall assign the RNP of a leg in the following order of precedence:

- a. use the pilot entered RNP, if defined*
- b. use the RNP for the current leg or route, if defined*
- c. use the RNP coded in the navigation data base for the area, if defined.*

Note 1: The above requirement anticipates the future definition of RNP for specified airspace regions, such as the North Atlantic Track System.

- d. Use an equipment default RNP, if available.*

2.3 Industry

The applicant FMS is compliant with section 2.2.1.2.12.2 a., b. and d.

For 2.2.1.2.12.2 c., the RNP for an area is provisioned in the ARINC 424 specification, but is not currently defined by the ARINC 424 standard, and therefore cannot be implemented.

If a. and b. do not apply, the FMS uses the default RNP.

The applicant intends to implement this requirement once ARINC defines the standard.

2.4 Equivalent Level of Safety

If the aircraft is in an area that has a lower RNP than the RNP selected by the FMS, the crew can enter manual RNP.

Instructions to this effect are incorporated in the FMS User Manual.

A similar deviation C115c#3 was already granted for the previous revision of this same ETSO.

2.5 EASA position

We accept the deviation.