

ARINC 424 NDB

Draft 4 of Supplement 23
Proposal

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ADD OFFICE OF PRIMARY RESPONSIBILITY

V.1

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SUMMARY

Garmin is proposing to add the office of primary responsibility (OPR) to
SIDs/STARs/Approaches

Rev1: Changed definition to be military/civilian AIP instead of procedure designer

ADD OFFICE OF PRIMARY RESPONSIBILITY

1.0 INTRODUCTION/ BACKGROUND

The Type 1 database suppliers send us the procedures from the civilian and military AIPs in the same NavDB. For example, the King Salmon (PAKN) airport has two ILS procedures to RW12; one which has a FAA OPR and the other has a US Air Force (USAF) OPR.

KING SALMON, ALASKA			AL-1237 (FAA)	21112
LOC/DME I-AKN 110.3 Chan 40	APP CRS 121°	Rwy Idg 8501 TDZE 62 Apt Elev 73	ILS Y or LOC Y RWY 12 KING SALMON (AKN)(PAKN)	

Figure 1: PAKN I12-Y FAA

KING SALMON, ALASKA			AL-1237 [USAF]	21112
LOC/DME I-AKN 110.3 Chan 40	APCH CRS 121°	Rwy Idg 8501 TDZE 62 Arpt Elev 73	HI-ILS Z or LOC Z RWY 12 KING SALMON (PAKN)	

Figure 2: PAKN I12-Y USAF

This will be sent to us in the ARINC 424 database without any indication of which one is published in the civilian versus military AIP, with the military AIP coming with a built-in expectation of limited access.

2.0 DISCUSSION and/or ACTION

Garmin proposes to add a new office of primary responsibility (OPR) field to the SID/STAR/Approach records to distinguish the procedures which are published in the civilian versus military AIP.

3.0 Legacy ARINC 424 changes as depicted (Track Changes is Helpful)

3.1 Update Chapter 4, Table 4.1.9.2:

3.1.1 Add OPR

4.1.9.2 Airport SID/STAR/Approach Primary Extension Continuation Records

Column	Field Name (Length)	Reference
...		
111	Special Indicator	5.37
112 thru 115	Reserved (14)	
113	OPR	5.###
114 thru 115	Reserved (2)	
116 thru 118	Vertical Scale Factor	5.293
...		

3.2 Update Chapter 4, Table 4.2.3.2:

3.2.1 Add OPR

4.2.3.2 Heliport SID/STAR/Approach Primary Extension Continuation Records

Column	Field Name (Length)	Reference
...		
111	Special Indicator	5.37
112 thru 115	Reserved (14)	
113	OPR	5.###
114 thru 115	Reserved (2)	
116 thru 118	Vertical Scale Factor	5.293
...		

3.3 Update Chapter 5, Field Definitions: Add new field definition for OPR

5.### Office of Primary Responsibility (OPR)

Definition/Description: The Office of Primary Responsibility (OPR) indicates if the procedure was sourced in the civilian or military aeronautical information publication (AIP). The procedures from the military may be sourced in a separate AIP with the expectation that they should only be flown by military aircraft.

Source/Content: The OPR is derived from official government source. The OPR shall be packed in at least one Primary Extension record per procedure. If the Primary Extension record is output more than once on a procedure, the OPR value shall always be the same value.

Field Content	Definition
C	Civilian AIP (e.g. FAA)
M	Military AIP (e.g. USAF, USN, USA)

Used On: SID/STAR/APP Continuation (Primary Ext)
Length: 1 character
Character Type: Alpha
Examples: C, M

4.0 XML ARINC 424 changes as depicted (Track Changes is Helpful)

- Jira Ticket: [ARINC-272](#)
- Git Feature Branch: [feature/ARINC-272-add-opr](#)
- Summary of changes:

4.1 Update Enumerations.xsd:

4.1.1 Add simpleType “OPR” with two enumerations: Civilian & Military

ADD OFFICE OF PRIMARY RESPONSIBILITY

```
5087 5087 </xs:simpleType>
5088 + <xs:simpleType name="OPR">
5089 +   <xs:annotation>
5090 +     <xs:documentation>The Office of Primary Responsibility ("OPR") field indicates if
5091 +   </xs:annotation>
5092 +   <xs:restriction base="xs:string">
5093 +     <xs:enumeration value="Civilian">
5094 +       <xs:annotation>
5095 +         <xs:documentation>Civilian AIP (e.g. FAA)</xs:documentation>
5096 +       </xs:annotation>
5097 +     </xs:enumeration>
5098 +     <xs:enumeration value="Military">
5099 +       <xs:annotation>
5100 +         <xs:documentation>Military AIP (e.g. USAF, USN, USA)</xs:documentation>
5101 +       </xs:annotation>
5102 +     </xs:enumeration>
5103 +   </xs:restriction>
5104 + </xs:simpleType>
5088 5105 </xs:schema>
```

4.2 Update SIDSTARApproach.xsd:

4.2.1 Add "opr" element as OPR enumeration

```
69 </xs:annotation>
70 </xs:element>
71 + <xs:element name="opr" type="enum:OPR" minOccurs="0" maxOccurs="1">
72 +   <xs:annotation>
73 +     <xs:documentation>The Office of Primary Responsibility (OPR) indicates if
74 +   </xs:annotation>
75 + </xs:element>
76 </xs:sequence>
77 <xs:attribute name="referenceId" use="required" type="xs:ID"/>
78 </xs:extension>
```

Figure 4: XML Changes to SIDSTARApproach.xsd