

PUBLIC NOTICE

Federal Communications Commission
445 12th St., S.W.
Washington, D.C. 20554

News Media Information 202 / 418-0500
Internet: <https://www.fcc.gov>
TTY: 1-888-835-5322

DA 20-437

Released: April 21, 2020

WIRELESS TELECOMMUNICATIONS BUREAU AND OFFICE OF ENGINEERING AND TECHNOLOGY APPROVE SPECTRUM ACCESS SYSTEM ADMINISTRATOR AMDOCS FOR FULL SCALE COMMERCIAL DEPLOYMENT IN THE 3.5 GHZ BAND

GN Docket No. 15-319

I. INTRODUCTION

1. With this *Public Notice*, the Wireless Telecommunications Bureau (WTB) and the Office of Engineering and Technology (OET) (collectively, WTB/OET) of the Federal Communications Commission (Commission or FCC) certify Amdocs, Inc. (Amdocs) as a Spectrum Access System (SAS) Administrator in the 3.55-3.7 GHz band (3.5 GHz band). WTB/OET, in consultation with the Department of Defense (DoD) and the National Telecommunications and Information Administration (NTIA), have reviewed Amdocs's Initial Commercial Deployment (ICD) report, and each has attested that Amdocs has met the requirements in Part 96 of our rules and is authorized to make its SAS available for commercial use for a five-year term.¹

II. BACKGROUND

2. In the *2015 Report and Order*, the Commission directed WTB/OET, in consultation with the DoD and NTIA, to oversee the review, certification, and approval of SAS Administrators in the 3.5 GHz band.² The *2015 Report and Order* required all prospective SAS Administrators to complete a two-stage review process prior to final certification.³ In the first stage, a prospective SAS Administrator must submit a proposal describing how its system will comply with all Commission rules governing the construction, operation, and approval of SASs and will perform all core functions described in the *2015 Report and Order*.⁴ The second stage involves SAS testing both in a controlled lab environment and in a

¹ See 47 C.F.R. 96.63(e).

² See generally *Amendment of the Commission's Rules with Regard to Commercial Operations in the 3550-3650 MHz Band*, GN Docket No. 12-354, Report and Order and Second Further Notice of Proposed Rulemaking, 30 FCC Rcd 3959, 4067, paras. 369-373 (2015) (*2015 Report and Order* and *2015 FNPRM*, respectively); see also 47 CFR §§ 0.241(j), 0.331(f).

³ See *Wireless Telecommunications Bureau and Office of Engineering and Technology Establish Procedure and Deadline for Filing Spectrum Access System (SAS) Administrator(s) and Environmental Sensing Capability (ESC) Operator(s) Applications*, GN Docket No. 15-319, Public Notice, 30 FCC Rcd 14170, 14174-77 (WTB/OET 2015) (*First Wave Proposal Public Notice*).

⁴ See *2015 Report and Order*, 30 FCC Rcd at 4054-55, para. 320 (listing SAS core functions); see also *First Wave Proposal Public Notice*, 30 FCC Rcd 14170; *Wireless Telecommunications Bureau and Office of Engineering and*

(continued...)

real-world setting.⁵ On December 21, 2016, WTB/OET conditionally approved the first wave of SAS Administrators, thus concluding the first stage of the review process.⁶

3. As part of the second stage testing process, Amdocs and other conditionally approved SAS Administrators elected to collaborate with the Institute for Telecommunication Sciences (ITS), NTIA's research and development arm, to complete the laboratory testing requirement.⁷ ITS completed its laboratory testing on May 3, 2019, and it subsequently provided Amdocs with a SAS laboratory test report, which Amdocs submitted for the Commission's review in July 2019.⁸

4. In order to comply with the field-testing requirement, Amdocs timely filed an ICD proposal with the Commission, which described its proposed short-term, limited geographic commercial deployment, and later supplemented its proposal.⁹ On September 16, 2019, WTB/OET found that certain SAS Administrators, including Amdocs, had satisfied the Commission's SAS laboratory testing requirements, and they approved certain SAS Administrators, including Amdocs, to begin ICD as described in their ICD proposals.¹⁰ In accordance with the *ICD Approvals PN*, Amdocs notified the Commission of commencement of its ICD.¹¹ After the requisite 30-day ICD period and consistent with the *ICD Proposals Public Notice*, Amdocs filed its ICD report with the Commission in GN Docket 15-319, and requested confidential treatment.¹² WTB/OET, in coordination with NTIA and DoD, reviewed the ICD report in detail.¹³

III. DISCUSSION

5. Based on our review of the information contained in Amdocs's ICD report in addition to all previously filed information in this proceeding, we certify that Amdocs's SAS complies with our rules, and we approve Amdocs for commercial operation subject to ongoing compliance with the Commission's rules, including the specific compliance obligations set forth below. Specifically, Amdocs may operate as a SAS Administrator on a commercial basis subject to the following compliance obligations, which

(Continued from previous page) _____
Technology Conditionally Approve Seven Spectrum Access System Administrators for the 3.5 GHz Band, Public Notice, 31 FCC Rcd 13355 (WTB/OET 2016) (*SAS Conditional Approval Public Notice*).

⁵ See *2015 Report and Order*, 30 FCC Rcd at 4067, para. 372 (noting that the final compliance testing phase can include a public testing period, testing of protections for incumbent systems, and field trials). On July 27, 2018, WTB/OET released a Public Notice that described the procedure and deadline for filing Initial Commercial Deployment (ICD) proposals. See *Wireless Telecommunications Bureau and Office of Engineering and Technology Establish Procedure and Deadline for Filing Spectrum Access System Initial Commercial Deployment Proposals*, Public Notice, 33 FCC Rcd 7390 (WTB/OET 2018) (*ICD Proposals Public Notice*). The ICD requirement is meant to fulfill the Commission's requirement that applicants conduct a public testing period and field trials prior to final certification. *2015 Report and Order*, 30 FCC Rcd at 4067, para. 372.

⁶ *SAS Conditional Approval Public Notice*, 31 FCC Rcd 13355 (conditionally approving the following seven SAS Administrators: Amdocs, Inc.; CommScope; CTIA; Federated Wireless, Inc.; Google; iPosi; Key Bridge; and Sony Corporation). CTIA later withdrew its proposal. See Letter from Paul Anuszkiewicz et al., Vice President, Spectrum Planning, CTIA, to Marlene H. Dortch, Secretary, FCC, GN Docket No. 15-319 (filed Nov. 20, 2017).

⁷ While lab testing of individual SASs is required before final certification, participation in either the process of verifying and validating the test harness or the subsequent lab testing of an individual SAS with ITS is optional and is not a prerequisite to submitting an ICD proposal or to obtaining final certification. *ICD Proposals Public Notice*, 33 FCC Rcd at 7392, para. 4.

⁸ See *ICD Proposals Public Notice*, 33 FCC Rcd at 7390, para. 1. Conditionally approved SAS Administrators were permitted to file their laboratory testing reports in GN Docket No. 15-319. *ICD Proposals Public Notice*, 33 FCC Rcd at 7392, para. 5. Amdocs chose to file its laboratory testing report with the Commission and requested confidential treatment. See Letter from Robert A. Silverman, Counsel for Amdocs, Inc., to Marlene H. Dortch, Secretary, FCC, GN Docket No. 15-319 (filed July 24, 2019).

⁹ *ICD Proposals Public Notice*, 33 FCC Rcd at 7390, para. 1. ICD proposals and any supplements were filed in GN Docket No. 15-319 consistent with the Commission's instructions. *ICD Proposals Public Notice*, 33 FCC Rcd at

(continued....)

remain consistent with those described in the *SAS Conditional Approval Public Notice*, our rules, and the conditions required of other SAS Administrators approved for full scale commercial deployment:¹⁴

- Amdocs must comply with all current and future Commission rules and policies, as well as all instructions issued by WTB, OET, or the Enforcement Bureau (EB), including any processes for interference reporting, consistent with Sections 0.241(j) and 0.331(f) of the Commission's rules and procedures¹⁵ applicable to SASs on an ongoing basis.¹⁶ Amdocs must also comply with requests for additional information from the Commission, WTB, OET or EB.
- As commercial deployments expand, Amdocs must demonstrate continued compliance with all current and future Commission rules and policies, which may include working with commercial and non-commercial users to demonstrate compliance with protection criteria. For example, a SAS may be required to demonstrate proper interoperation with its associated ESC to demonstrate effective protection of federal incumbents from actual commercial deployments.
- Amdocs must protect current and future federal incumbent operations in and near the 3.5 GHz band, as set forth in the Commission's rules.¹⁷ Amdocs must be attentive to changes in protection criteria, such as those NTIA identified in January 2020 for Category B CBRS base stations, and to modifications to the list of sites identified by NTIA.¹⁸ Amdocs must be able to receive and address reports of interference from federal Incumbent Access tier users. In addition, Amdocs must work with the FCC, NTIA, and DoD to address interference issues expeditiously and to implement any new reporting processes as they are developed.¹⁹
- If Amdocs chooses to support PAL leasing, it must submit a supplemental filing in GN Docket No. 15-319 and demonstrate the functionality of its leasing system before offering

(Continued from previous page)

7394-95, para. 11. Amdocs requested confidential treatment for its ICD filings. See Letter from Letter from Caressa D. Bennet, Counsel for Amdocs, Inc., to Marlene H. Dortch, Secretary, FCC, GN Docket No. 15-319 (filed Sep. 10, 2018) (ICD proposal); Letter from Letter from Robert Silverman, Counsel for Amdocs, Inc., to Marlene H. Dortch, Secretary, FCC, GN Docket No. 15-319 (filed September 12, 2019) (Supplement).

¹⁰ *Wireless Telecommunications Bureau and Office of Engineering and Technology Announce Five Spectrum Access System Administrators to Begin Initial Commercial Deployments in the 3.5 GHz Band*, GN Docket 15-319, Public Notice, 34 FCC Rcd 8106 (2019 WTB/OET) (*ICD Approvals PN*).

¹¹ Letter from Letter from Robert Silverman, Counsel for Amdocs, Inc., to Marlene H. Dortch, Secretary, FCC, GN Docket No. 15-319 (filed Nov. 27, 2019) (notifying Commission of ICD commencement date of December 1, 2019). As permitted in the *ICD Approvals PN*, 34 FCC Rcd at 8111, para. 10, Amdocs filed a notification to expand its ICD. See Letter from Letter from Robert Silverman, Counsel for Amdocs, Inc., to Marlene H. Dortch, Secretary, FCC, GN Docket No. 15-319 (filed Jan. 30, 2020).

¹² Letter from Letter from Robert Silverman, Counsel for Amdocs, Inc., to Marlene H. Dortch, Secretary, FCC, GN Docket No. 15-319 (filed Feb. 26, 2020).

¹³ Amdocs was one of five SAS Administrators approved to begin ICD in the 3.5 GHz band. See *ICD Approvals PN*, 34 FCC Rcd 8106.

¹⁴ See *SAS Conditional Approval Public Notice*, 31 FCC Rcd at 13356-58, para. 7; *Wireless Telecommunications Bureau and Office of Engineering and Technology Approve Four Spectrum Access Administrators for Full Scale Commercial Deployment in the 3.5 GHz Band and Emphasize Licensee Compliance Obligations in the 3650-3700 MHz Band Under Part 96*, Public Notice, 35 FCC Rcd 117, 118-20, para. 5 (WTB/OET 2020).

¹⁵ See 47 CFR §§ 0.241(j), 0.1331(f) (delegating authority to WTB/OET to oversee the SAS approval process and facilitate the testing and development of multiple SAS operators).

¹⁶ See, e.g., 47 CFR §§ 96.53-96.65.

PAL leasing services.²⁰

- Amdocs is certified to operate in the contiguous United States, Alaska, Hawaii, Puerto Rico, and Guam. If Amdocs intends to operate in additional U.S. Territories and Possessions, it must submit a filing in GN Docket No. 15-319 detailing the additional territories that it plans to cover. These supplemental filings must include all information necessary for WTB/OET to make a determination regarding Amdocs's ability to provide service to each territory, including terrain maps and associated ESC sensor coverage information (where applicable).
- If Amdocs plans to make substantive changes to its system, for example, to comply with new releases of industry standards, Amdocs must supplement or amend its filings in GN Docket No. 15-319 to reflect these changes.²¹ Before WTB/OET approves the use of new or modified SAS features, Amdocs must demonstrate that the modified SAS will continue to comply with the Commission's rules, and it may be required to submit its systems for additional testing. Upon request, Amdocs must provide external testing interfaces to enable WTB/OET, in collaboration with NTIA and DoD, to verify that the proposed modifications comply with the relevant rules as specified by the Commission.

6. The above conditions will ensure that Amdocs will continue to comply with the Commission's rules. Amdocs's certification may be revoked at any time if Amdocs fails to comply with the Commission's rules and guidance on an ongoing basis.

By the Chief, Wireless Telecommunications Bureau, and the Acting Chief, Office of Engineering and Technology.

-FCC-

(Continued from previous page) _____

¹⁷ See 47 CFR § 96.15.

¹⁸ See Letter from Charles Cooper, Assoc. Admin., Office of Spectrum Mgt., NTIA, to Ronald T. Repasi, Chief (Acting) OET, and Donald Stockdale, Jr., Chief, WTB, FCC (Jan. 22, 2020), available at <https://www.ntia.doc.gov/fcc-filing/2015/ntia-letter-fcc-commercial-operations-3550-3650-mhz-band>; <https://www.fcc.gov/ecfs/filing/101220466714222>.

¹⁹ See, e.g., 47 CFR §§ 96.53, 96.55.

²⁰ See 47 CFR § 96.66.

²¹ For example, to the extent that Amdocs later incorporates any future WinnForum standards or any revisions to existing WinnForum standards into its system, such standards and revisions must also be consistent with Commission rules.