

Title: Digital Audio Broadcasting Systems and their Impact on the Terrestrial Radio Broadcast Service; Form 2100, Schedule 335-FM – FM Digital Notification; Form 2100, Schedule 335-AM – AM Digital Notification

SUPPORTING STATEMENT

Description of Information Collection:

Justification:

1. The Commission is requesting Office of Management and Budget (OMB) approval for an extension of an existing information collection.¹

FM and AM broadcast station licensees are required to notify the Commission of certain changes in digital operations using the Digital Notification Forms, FCC Form 2100, Schedules 335-FM and 335-AM (or any successor notification forms).²

History:

2020 All-Digital AM Broadcasting Report and Order

In the Commission’s *All-Digital AM Broadcasting Report and Order*³ adopted October 27, 2020, and released on October 28, 2020, the Commission adopted rules to allow AM radio stations, on a voluntary basis, to broadcast an all-digital signal using the HD radio in-band on-channel (IBOC) mode named MA3. This action benefits AM stations and their listeners by improving reception quality and listenable signal coverage in stations’ service areas and by advancing the Commission’s goal of improving the AM service, thereby helping to ensure the future of the service. AM broadcast station licensees are required to notify the Commission of a change to all-digital operations using the then-existing Digital Notification Form, FCC Form 335-AM.

Specifically pertaining to this Information Collection, in the *All-Digital AM Broadcasting Report and Order*, the Commission required AM broadcast stations to electronically file a digital notification⁴ using the then-existing FCC Form 335-AM Digital Notification (or any successor notification form) to notify the Commission of the following changes: (1) the commencement of new all-digital operation; (2) an increase in nominal power of an all-digital AM station; or (3) a transition from core-only to enhanced

¹ Pursuant to a non-substantive change request, granted December 4, 2023, by OMB, ICR Reference Number: 202310-3060-014, the new title of this Information Collection is: “Digital Audio Broadcasting Systems and their Impact on the Terrestrial Radio Broadcast Service; Form 2100, Schedule 335-FM – FM Digital Notification; Form 2100, Schedule 335-AM – AM Digital Notification.” (Prior to the non-substantive change, this Information Collection OMB Control No. 3060-1034 was named: “Digital Audio Broadcasting Systems and their Impact on the Terrestrial Radio Broadcast Service; Digital Notification Form, FCC Form 335.”)

² Pursuant to a non-substantive change request, granted December 4, 2023, by OMB, ICR Reference Number: 202310-3060-014, CDBS-based “FCC Form 335-FM, FM Digital Notification,” was renamed “Form 2100, Schedule 335-FM, FM Digital Notification,” and CDBS-based “FCC Form 335-AM, AM Digital Notification,” was renamed “Form 2100, Schedule 335-AM, AM Digital Notification.” Both notification forms are now encompassed within the new on-line, electronic licensing database system called the Licensing Modernization System (LMS).

³ *All-Digital AM Broadcasting; Revitalization of the AM Radio Service*, Report and Order, FCC 20-154, MB Dkts. 19-311, 13-249 (rel. Oct. 28, 2020) (*All Digital AM Broadcasting Report and Order*).

⁴ At the time of adoption, such notifications were submitted in the Bureau’s Consolidated Database System (CDBS). As noted above, the Bureau has now transitioned these notification forms from the CDBS database to the Licensing and Management System (LMS) database. Therefore, this notification requirement now applies to the LMS database.

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operating mode.⁵ Although the Commission directed broadcasters to use the then-current Form 335-AM for all-digital notifications, additional information is required for notification of AM all-digital operations specifically. Therefore, until the Form 335-AM is updated to display the new all-digital operation requirements, we directed filers to select “N/A” as appropriate within the form and submit an attachment containing the following information. As discussed below, these new all-digital AM notification requirements have been added to new section 73.406 of the Commission’s rules.⁶

- (a) the type of notification (all-digital notification, increase in nominal power, reduction in nominal power, transition from core-only to enhanced, transition from enhanced to core-only, reversion from all-digital to hybrid or analog operation);
- (b) the date that new or modified all-digital operation will commence or has ceased;
- (c) a certification that the all-digital operations will conform to the relevant nominal power and spectral emissions limits;
- (d) the nominal power of the all-digital station;
- (e) a certification that the all-digital station complies with all EAS requirements; and
- (f) if a notification of commencement of new all-digital service or a nominal power change, whether the station is operating in core-only or enhanced mode.

The *All-Digital AM Broadcasting Report and Order* also revised and reorganized the digital notification requirements formally contained in section 73.404(e) of the rules by removing paragraph 73.404(e) and adding new section **73.406 Notification**.

47 CFR 73.406 Notification

Hybrid AM and FM licensees must electronically file a digital notification to the Commission in Washington, DC, within 10 days of commencing IBOC digital operation. All-digital licensees must file a digital notification within 10 days of the following changes: (1) any reduction in nominal power of an all-digital AM station; (2) a transition from enhanced to core-only operating mode; or (3) a reversion from all-digital to hybrid or analog operation. All-digital licensees will not be permitted to commence operation sooner than 30 calendar days from public notice of digital notification of the following changes: (1) the commencement of new all-digital operation; (2) an increase in nominal power of an all-digital AM station; or (2) a transition from core-only to enhanced operating mode.

- (a) Every digital notification must include the following information:
 - (1) The call sign and facility identification number of the station;
 - (2) If applicable, the date on which the new or modified IBOC operation commenced or ceased;
 - (3) The name and telephone number of a technical representative the Commission can call in the event of interference;
 - (4) A certification that the operation will not cause human exposure to levels of radio frequency radiation in excess of the limits specified in § 1.1310 of this chapter and is therefore categorically excluded from environmental processing pursuant to § 1.1306(b) of this chapter. Any station that

⁵ *All Digital AM Broadcasting Report and Order* at para. 37.

⁶ 47 CFR § 73.406 Notification.

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cannot certify compliance must submit an environmental assessment (“EA”) pursuant to § 1.1311 of this chapter and may not commence IBOC operation until such EA is ruled upon by the Commission.

(b) Each AM digital notification must also include the following information:

(1) A certification that the IBOC DAB facilities conform to applicable nominal power limits and emissions mask limits;

(2) The nominal power of the station; if separate analog and digital transmitters are used, the nominal power for each transmitter;

(3) If applicable, the amount of any reduction in an AM station’s digital carriers;

(4) For all-digital stations, the type of notification (all-digital notification, increase in nominal power, reduction in nominal power, transition from core-only to enhanced, transition from enhanced to core-only, reversion from all-digital to hybrid or analog operation);

(5) For all-digital stations, if a notification of commencement of new all-digital service or a nominal power change, whether the station is operating in core-only or enhanced mode; and

(6) For all-digital stations, a certification that the all-digital station complies with all EAS requirements.

(c) Each FM digital notification must also include the following information:

(1) A certification that the IBOC DAB facilities conform to the HD Radio emissions mask limits;

(2) FM digital effective radiated power used and certification that the FM analog effective radiated power remains as authorized;

(3) If applicable, the geographic coordinates, elevation data, and license file number of the auxiliary antenna employed by an FM station as a separate digital antenna; and

(4) If applicable, for FM systems employing interleaved antenna bays, a certification that adequate filtering and/or isolation equipment has been installed to prevent spurious emissions in excess of the limits specified in § 73.317.

2010 Digital Audio Broadcasting Order

On January 29, 2010, the Commission released the Order, *Digital Audio Broadcasting Systems and Their Impact on the Terrestrial Radio Broadcast Service (Digital Audio Broadcasting Order)*, DA 10-208, MM Docket 99-325. The Order allowed:

(1) Eligible authorized FM stations to commence operation of FM digital facilities with digital effective radiated power (ERP) up to -14 dB upon notice to the Commission on Form 335 (the licensee of a super-powered FM station must file an informal request for any increase in the station’s FM Digital ERP).

(2) Licensees to submit an application to the Media Bureau, in the form of an informal request, for any increase in FM Digital ERP beyond 6 dB.

(3) Licensees submitting such a request must use a simplified method set forth in the *Digital Audio Broadcasting Order* to determine the proponent station’s maximum permissible FM Digital ERP.

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(4) In situations where the simplified method is not applicable due to unusual terrain or other environmental or technical considerations, or when it produces anomalous FM Digital ERP results, the Bureau will accept applications for FM Digital ERP in excess of -14 dBc on a case-by-case basis when accompanied by a detailed showing containing a complete explanation of the prediction methodology used as well as data, maps and sample calculations.

(5) Finally, the *Digital Audio Broadcasting Order* implemented interference mitigation and remediation procedures to resolve promptly allegations of digital interference to an authorized FM analog facility resulting from an FM Digital ERP power increase undertaken pursuant to the procedures adopted in the *Order*. Pursuant to these procedures, the affected analog FM station may file an interference complaint with the Bureau. In order to be considered by the Bureau, the complaint must contain at least six reports of ongoing (rather than transitory) objectionable interference. For each report of interference, the affected FM licensee must submit a map showing the location of the reported interference and a detailed description of the nature and extent of the interference being experienced at that location. Interference reports at locations outside a station's protected analog contour will not be considered. The complaint must also contain a complete description of the tests and equipment used to identify the alleged interference and the scope of the unsuccessful efforts to resolve the interference.

2007 Second Report and Order re Digital Audio Broadcasting

In May 2007, the Commission released the Second Report and Order, *Digital Audio Broadcasting Systems and Their Impact on the Terrestrial Radio Broadcast Service (Second Order)*, FCC 07-33, MM Docket 99-325. Provisions of the *Second Order* require radio station licensees to provide information necessary for the implementation of interim hybrid digital operations. Implementation of hybrid digital operations is entirely voluntary.

47 CFR 73.404(b) states, in situations where interference to other stations is anticipated or actually occurs, AM licensees may, upon notification to the Commission, reduce the power of the primary Digital Audio Broadcasting (DAB) sidebands by up to 6 dB. Any greater reduction of sideband power requires prior authority from the Commission via the filing of a request for special temporary authority⁷ or an informal letter request for modification of license.

47 CFR 73.404(e) states licensees (commercial and noncommercial AM and FM radio stations) must provide notification to the Commission in Washington, DC, within 10 days of commencing in-band, on channel (IBOC) digital operation.⁸ The notification must include the following information:

- (1) call sign and facility identification number of the station;
- (2) date on which IBOC operation commenced;
- (3) certification that the IBOC DAB facilities conform to permissible hybrid specifications;
- (4) name and telephone number of a technical representative the Commission can call in the event of interference;
- (5) certification that the analog effective radiated power remains as authorized;

⁷ Licensees may request special temporary authority (STA) to operate new or modified equipment. The requests must contain complete details about the proposed operation and the circumstances that fully justify and necessitate the grant of STA.

⁸ IBOC digital operations permit the licensee to introduce digital operation efficiently and rapidly.

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- (6) transmitter power output; if separate analog and digital transmitters are used, the power output for each transmitter;
- (7) if applicable, any reduction in an AM station's primary digital carriers;
- (8) if applicable, the geographic coordinates, elevation data, and license file number of the auxiliary antenna employed by an FM station as a separate digital antenna;
- (9) if applicable, for FM systems employing interleaved antenna bays, a certification that adequate filtering and/or isolation equipment has been installed to prevent spurious emissions in excess of the limits specified in § 73.317;
- (10) a certification that the operation will not cause human exposure to levels of radio frequency radiation in excess of the limits specified in § 1.1310 of the Commission's rules and is therefore categorically excluded from environmental processing pursuant to § 1.1306(b). Any station that cannot certify compliance must submit an environmental assessment ("EA") pursuant to § 1.1311 and may not commence IBOC operation until such EA is ruled upon by the Commission. **(Note: This notification requirement was re-codified, revised in the 2020 submission to OMB, and is now under Section 73.406.)**

2002 First Report and Order re Digital Audio Broadcasting

In October 2002, the Commission released the First Report and Order, *Digital Audio Broadcasting Systems and Their Impact on the Terrestrial Radio Broadcast Service (First Order)*, FCC 02-286, MM Docket 99-325, (67 FR 78193). Pursuant to this *First Order*, the Commission selected IBOC as the technology that permits AM and FM radio broadcasters to introduce digital operations efficiently and rapidly. In addition, provisions of the *First Order* require radio station licensees to provide information necessary for the implementation of interim hybrid digital operations. Implementation of hybrid digital operations is entirely voluntary. Commercial and noncommercial AM and FM radio stations that choose to begin hybrid digital transmissions shall notify the Commission within 10 days of the commencement of digital operations. This "notification letter" shall certify that the digital operations conform to applicable rules and standards. Furthermore, implementation of the notification letter will eliminate both the need for the FCC staff to issue a Special Temporary Authority (STA) to the broadcaster and for the broadcaster to file and pay the initial and any subsequent filing fees.

This information collection does not affect individuals; therefore, there are no impacts under the Privacy Act.

Statutory authority for this collection of information is contained in Sections 154(i), 303, 310, and 533 of the Communications Act of 1934, as amended.

2. Agency Use of Information: FCC staff uses the data: to track the rate at which radio stations make the transition from analog to digital operations, or increase the power levels of their digital operations; to confirm continuing compliance with radio frequency radiation (RFR) exposure restrictions; to provide updated transmitter output power (TPO) levels for FM stations; and to assist in the resolution of interference complaints, if any, which may result from digital operations.

3. Consideration Given to Information Technology: Permittees/Licensees must electronically file FCC Form 2100, Schedules 335-FM and 335-AM in the Media Bureau's Licensing and Management System.

4. Effort to Identify Duplication and Similar Information: No other agency imposes a similar information collection on the respondents. There are no similar data available.

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5. Effort to Reduce Small Business Burden: In conformance with the Paperwork Reduction Act of 1995, the Commission is making an effort to minimize the burden on all respondents. Therefore, this information collection will not have a significant economic impact on a substantial number of small entities/businesses.

6. Less Frequent Data Collections: Foregoing the digital notification would deprive Commission staff of the means to assess the rate of digital conversion in the radio broadcasting service. In addition, the Commission would not be able to resolve expeditiously any cases of interference from digital operations without the information included in the digital notification form.

7. Information Collection Circumstances: There are no special circumstances associated with this collection of information.

8. Public Comment Period: The Commission published a Notice in the *Federal Register* on December 19, 2023 (88 FR 87766) seeking public comment for the information collection requirements contained in this supporting statement.

9. Payments or Gifts: No payment or gift was provided to respondents.

10. Confidentiality of Information: There is no need for confidentiality with this collection of information.

11. Justification for Sensitive Questions: This collection of information does not address any private matters of a sensitive nature.

12. Estimate of Burden and Burden Hour Cost: The following estimates are provided for public burdens for this information collection:

Rule Sections	Number of Respondents	Number of Responses	Burden Hours of Respondents	Annual Burden Hours	Hourly Salary of Respondents ⁹	Annual In-House Cost
AM/FM Hybrid Notifications: 73.406	115	115	2	230	\$48.08	\$11,058.40
AM All-Digital Notifications & Attachments: 73.406(a),(b)	20	20	2	40	\$48.08	\$1,923.20
FM Non-Rule Requirements						
Super-powered Stations Informal Application for any	5	5	2	10	\$48.08	\$480.80

⁹ The Commission estimates the average salary at \$100,000/year or \$48.08/hour for in-house personnel who include the station manager, engineer, and attorney.

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Rule Sections	Number of Respondents	Number of Responses	Burden Hours of Respondents	Annual Burden Hours	Hourly Salary of Respondents	Annual In-House Cost
increase in Digital ERP						
Electronic Notification of 6 dB Increase using Digital Notification Form 335	100	100	1	100	\$48.08	\$4,808.00
Informal Application for increase beyond 6 dB - Simplified Method	10	10	1	10	\$48.08	\$480.80
Case-by-case Showing for increase beyond 6 dB where Simplified Method is unavailable	10	10	2	20	\$48.08	\$961.60
Interference Complaints	10	10	8	80	\$48.08	\$3,846.40
Totals:	270	270		490 hours		\$ 23,559.20

13. Annual Cost Burden to Respondents: The respondent will also hire engineering and legal consultants to help fulfill the various information collection requirements contained in this collection.¹⁰

Type	Number of Forms	Consultant’s Burden	Total Annual Burden Hours	Consultant’s Hourly Fee	Cost Burden
AM All-Digital using Digital Notification Form 335-AM plus Attachments:					
Engineering Consultant	20	1	20	\$250.00	\$5,000
Super-Powered Stations:					
Engineering Consultant	5	6 hrs	30 hrs	\$250.00	\$7,500
Outside Attorney	5	2 hrs	10 hrs	\$300.00	\$3,000

¹⁰ There is no filing fee associated with this collection. 47 CFR § 1.1104. Also, consultants are not needed for the information collection requirements contained under section 73.404(b). Those requirements will be fulfilled by in-house staff and are covered under question 12 of this supporting statement. We estimate that the consulting engineer will have an average salary of \$250/hour and the outside attorney will charge approximately \$300/hour.

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Paraprofessional	2 hours x \$42.68/hour x 5 =	\$ 426.80
Professional	4 hours x \$71.88/hour x 5 =	<u>\$ 1,437.60</u>
TOTAL		\$ 1,980.80

Electronic Notifications of 6 dB increase using Digital Notification, Schedule 335-FM:¹¹

Professional	1 hour x \$71.88 x 100 =	\$ 7,188.00
Professional	1 hour x \$84.55 x 100 =	<u>\$ 8,455.00</u>
TOTAL		\$ 15,643.00

Informal Application for increase beyond 6 dB using Simplified Method:

Clerical	1 hour x \$23.28/hour x 10 =	\$ 232.80
Paraprofessional	1 hour x \$42.68/hour x 10 =	\$ 426.80
Professional	1 hour x \$71.88/hour x 10 =	<u>\$ 718.80</u>
TOTAL		\$ 1,378.40

Case-by-Case Showing for increase beyond 6 dB where Simplified Method is unavailable:

Clerical	1 hour x \$23.28/hour x 10 =	\$ 232.80
Paraprofessional	1 hour x \$42.68/hour x 10 =	\$ 426.80
Professional	4 hours x \$71.88/hour x 10 =	<u>\$2,875.20</u>
TOTAL		\$3,534.80

Interference Complaints:

Clerical	1 hour x \$23.28/hour x 10 =	\$ 232.80
Paraprofessional	1 hour x \$42.68/hour x 10 =	\$ 426.80
Professional	16 hours x \$71.88/hour x 10 =	<u>\$11,500.80</u>
TOTAL		\$12,160.40

The total cost: \$40,503.20

15. **Reason for Changes in Burdens or Costs:** There are no program changes or adjustments to this collection.

16. **Plans for Publication:** The data is electronically filed and is available to the public.

17. **Display of OMB Approval Date:** We are seeking continued approval to not display the expiration date on FCC Form 2100, Schedules 335-FM and 335-AM. This will obviate the need for the Commission to update electronic forms upon the expiration of the clearance. OMB approval of the expiration date of the information collection will be displayed on OMB's website.

18. **Exceptions to the Certification Statement:** There are no exceptions to the Certification Statement.

B. Collections of Information Employing Statistical Methods.

¹¹ Staff members at the GS-14 and 15 grade levels are involved with the review of digital notifications.

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No statistical methods are employed.