

**OFFICE OF ENGINEERING AND TECHNOLOGY
FEDERAL COMMUNICATIONS COMMISSION**

BIENNIAL REGULATORY REVIEW 2002

ET Docket No. 02-312

GC Docket No. 02-390

STAFF REPORT

DA 03-130

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OVERVIEW

1. The Office of Engineering and Technology (OET) provides technical and engineering support to all of the bureaus and offices, as well as the Commission. OET has primary responsibility for the management and allocation of non-government spectrum, the authorization of telecommunications equipment and RF regulated devices, and the administration of the Experimental Radio Service. OET has specific responsibility for Parts 2, 5, 15 and 18 of the Commission's Rules.¹ All of the rules governing these responsibilities were reviewed by staff to determine whether those rules that govern providers of telecommunications services are no longer necessary in the public interest as the result of meaningful economic competition, as provided in Section 11 of the Communications Act of 1934, as amended.² As part of this review, OET sought recommendations from the public regarding which rules and procedures should be modified or eliminated as part of its Section 11 review.³

SCOPE OF REVIEW

2. The Office of Engineering and Technology staff reviewed all of the rules that the Office administers. Specifically, the staff reviewed:

Part 2, Subpart A: Terminology - This subpart provides definitive terms and definitions for words and phrases used throughout the Commission's rules.

Part 2, Subpart B: Allocation, Assignment, and Use of Radio Frequencies – This subpart contains the Table of Allocations, which designates the uses of each frequency band and provides the basic framework for each radio service's rules.

Part 2, Subpart C: Emissions – This subpart designates emission, modulation and transmission characteristics of radio signals and the symbology to be used to identify them, and defines and provides formulas for “occupied bandwidth” and “necessary bandwidth.”

Part 2, Subpart D: Call Signs and Other Forms of Identifying Radio Transmissions – This subpart provides a system of distinctive call signs for each domestic and international station using radio frequencies, and provides for alternative forms of identification for certain classes of stations.

Part 2, Subpart E: Distress, Disaster, and Emergency Communications – This subpart provides for the priority and control of distress messages and emergency communications.

¹ 47 C.F.R. Parts 2, 5, 15 and 18.

² 47 U.S.C. § 161.

³ *Public Notice, The Commission Seeks Public Comment in the 2002 Biennial Review of Telecommunications Regulations Within the Purview of the Office of Engineering and Technology – ET Docket No. 02-312, FCC 02-266, September 26, 2002.*

Part 2, Subpart H: Prohibition Against Eavesdropping – This subpart prohibits the use of a radio device for eavesdropping private conversations, unless authorized by all of the parties in the conversation; the prohibition expressly does not apply to law enforcement officers operating under lawful authority.

Part 2, Subpart I: Marketing of Radiofrequency Devices – This subpart provides the equipment certification requirements for radiofrequency devices be certified prior to importation or marketing in the U.S.

Part 2, Subpart J: Equipment Authorization Procedures – This subpart describes the general application procedures and general technical requirements for the authorization of regulated equipment that generates radiofrequency energy.

Part 2, Subpart K: Importation of Devices Capable of Causing Harmful Interference – This subpart provides for the temporary and limited importation of certain devices that would normally need an equipment authorization, for use at trade shows or for testing and developmental purposes, as well as subassemblies and certain unintentional radiators.

Part 2, Subpart M: Advance Approval of Subscription TV Transmission Systems – This subpart provides for the approval of any transmission system that will be used for providing subscription television service.

Part 2, Subpart N: FCC Procedure for Testing Class A, B and S Emergency Position Indicating Radiobeacons (EPIRBs) – This subpart sets out the approved procedures for testing EPIRBs.

Part 5 – Experimental Radio Services (Other Than Broadcast) - This Part provides for the temporary licensing of radio facilities in order to conduct experimental operations.

Part 15 – Radio Frequency Devices – This Part provides technical guidance regarding radio devices, including prevention of interference.

Part 18 – Industrial Scientific, and Medical Equipment – This Part provides for noncommunications uses of radiofrequency energy for industrial, scientific and medical purposes.

Recent and Ongoing Activities

3. OET has responsibility for authorizing radio frequency equipment and devices and for maintaining the Table of Allocations, and has continually modified its rules to accommodate new technologies and associated services, in light of the operations of incumbent service providers. Through various spectrum management efforts, the Commission has endeavored to facilitate new, innovative and competitive services, and to eliminate rules that are no longer in the public interest in light of increased competition.

4. OET has led the efforts of the Spectrum Policy Task Force (SPTF), which recently issued its Report of findings and recommendations with regard to improving the way that the electromagnetic radio spectrum is “managed” in the United States.⁴ Through a series of meetings, comments, and public forums, the Task Force investigated current and anticipated technology and spectrum use, and as a result it has found that advances in technology have opened the potential for more intensive and efficient utilization of the spectrum, and it recommended a number of reforms that should be undertaken to streamline the Commission’s rules and processes and provide for greater flexibility and efficiency for manufacturers, licensees, and other service providers in providing service to the public.⁵ The Commission has requested public comment on the Task Force’s Report.⁶

5. Additionally, the Commission has undertaken more specific efforts to advance the goals of efficient and more effective spectrum management in light of increased competition in the provision of telecommunications services. It has completed various proceedings to accommodate the introduction of advanced technologies not previously contemplated by the Commission’s rules, which provide a wide range of consumer and industrial uses. The agency has recently provided rule interpretations and modifications to permit the marketing and development of ultra wideband (UWB) technology, in which a device operates across a wide range of spectrum with very little power in any individual spectrum segment.⁷ Such devices, consequently, cannot be confined to a conventionally limited bandwidth, and our rules needed to be adjusted accordingly to accommodate them. The Commission also modified the rules to accommodate recent and future advancements in spread spectrum technologies, to provide greater flexibility in the design and operation of these popular and very useful and efficient devices.⁸

6. Two years ago, the Commission adopted a *Secondary Markets Policy Statement* setting forth principles for promoting the efficient use of radio spectrum by encouraging the development of secondary markets and identifying key areas the Commission will focus on in its efforts to foster the development of secondary markets.⁹ At the same time, as a first step in this effort, the Commission proposed rule changes to

⁴ *Report of the Spectrum Policy Task Force*, ET Docket No. 02-135, (*SPTF Report*) released November 15, 2002.

⁵ *Id.*, at 1-6.

⁶ *See Public Notice, Commission Seeks Public Comment on Spectrum Policy Task Force Report*, FCC 02-322 (released Nov. 25, 2002).

⁷ *First Report and Order in ET Docket No. 98-153 (Ultra-Wideband Order)*, 17 FCC Rcd 7435 (2002).

⁸ *Second Report and Order in ET Docket No. 99-231 (Spread Spectrum Second Order)*, FCC 02-151, released May 30, 2002.

⁹ *Principles for Promoting the Efficient Use of Spectrum by Encouraging the Development of Secondary Markets for Spectrum, (Secondary Markets Policy Statement)*, FCC 00-401 (released Dec. 1, 2000).

enable wider use of spectrum rights leasing by licensees of wireless radio spectrum.¹⁰ A key element of increasing access is providing for more efficient access by providing for a secondary market in which to transfer, lease, or subdivide spectrum rights, by revising the rules identified in the *Secondary Markets* proceeding.¹¹

7. The Commission has taken additional actions to facilitate the development of unlicensed technologies. It has lifted restrictions on the use of spectrum at 24 GHz to permit the deployment of a new generation of communications devices that will facilitate the introduction of a variety of new, innovative products and services, in that band, such as managing the network traffic on a high-speed wireless internet service or connecting a multiple-building intra-office network.¹² The Commission has proposed to take additional actions to provide further opportunities for unlicensed devices, as further outlined below.

8. In the *2000 Biennial Regulatory Review*, the Commission determined to review the Part 15 emission limits above 2 GHz to determine whether any changes are warranted.¹³ In response to this recommendation, the Commission sought comment on the need for changes to the emission limits above 2 GHz in two specific instances.¹⁴ In the first instance, the Commission sought comment on whether there is a need to continue to designate the entire frequency range above 38.6 GHz as a restricted band because this designation may require devices to comply with tighter harmonic emission limits above 38.6 GHz than are necessary to prevent interference. In response to comments stating that there is a need to remove the restricted designation from certain frequency bands above 38.6 GHz, the staff has consulted with NTIA concerning possible changes to these bands, but no changes have been adopted by the Commission at this time. In the second instance, the Commission sought comment on whether there is a need to require radar detectors to meet emission limits to protect very small aperture satellite terminals (VSATs) from interference in the 11.7-12.2 GHz band. In response to comments showing that there was a need for such changes, the Commission required radar detectors to comply with the Part 15 emission limits for unintentional radiators in the 11.7-12.2 GHz VSAT downlink band and required radar detectors to be certified to demonstrate compliance with the limits.¹⁵

¹⁰ *Promoting Efficient Use of Spectrum through Elimination of Barriers to the Development of Secondary Markets, Notice of Proposed Rulemaking*, WT Docket No. 00-230, FCC 00-402 (released Nov. 27, 2000).

¹¹ *Id.*, at 17.

¹² *Report and Order in ET Docket No. 98-156 (24 GHz Order)*, FCC 01-357, released December 14, 2001.

¹³ 2000 Biennial Review *Updated Staff Report* at Appendix A, pages 21 and 26.

¹⁴ *Notice of Proposed Rule Making and Order* in ET Docket No. 01-278, 16 FCC Rcd 18205 (2001).

¹⁵ *First Report and Order* in ET Docket No. 01-278, 17 FCC Rcd 14063 (2002).

9. With implications for both unlicensed and licensed spectrum and services, the Commission interpreted and modified rules to facilitate the development and deployment of software defined radios.¹⁶ In a software defined radio, functions formerly performed solely in hardware are performed by software. This innovation, which makes a radio programmable, can facilitate interoperability between radio services, improve efficient use of spectrum, expand opportunities for broadband communication access for all persons, increase competition among telecommunications service providers, decrease equipment costs for consumers, and increase worldwide market opportunities for US manufacturers of all sizes.

10. In addition to unlicensed spectrum initiatives, the Commission has undertaken to provide for the utilization of extremely high (millimeter wave) frequencies, previously not even contemplated in our rules or allocations table.¹⁷ Such transmission would utilize very narrow transmission paths, with a capability for high speed transmissions and great frequency re-use. Anticipated uses for this spectrum include a broad range of point-to-point services.

11. The Commission anticipates that new spectrum allocations, rules and principles will enable a broad range of new competitive radio communications services, such as expanded wireless services, advanced mobile services, and new spectrum-efficient private land mobile systems. The development of a broad range of new devices and communications options will stimulate economic development and the growth of new industries and promote the ability of manufacturers, including small businesses and entrepreneurs to compete both domestically and globally.

Section 11 Analysis of Current Rules

12. As further discussed in the appendix, the various rules directly within the purview of OET generally do not directly apply to the operations or activities of any telecommunications service provider, and thus are outside the scope of this Section 11 review. Moreover, the public interest need for the rules implemented by OET are generally unaffected by the degree of economic competition that may or may not exist among those covered by these rules. The comments received suggest various revisions that are outside the scope of this Section 11 review, as also discussed further in the appendix, and OET does not find that any of the rules within its purview are no longer necessary in the public interest as the result of meaningful economic competition. The recommendations for rule revisions submitted by commenters will be taken up, as appropriate, in another proceeding or proceedings.

CONCLUSION

13. This Staff Report describes OET's extensive efforts in the last two years to update its rules to facilitate new technologies and services for the public and to provide

¹⁶ *First Report and Order in ET Docket No. 00-47 (SDR Order)*, FCC 01-264, released September 14, 2001.

¹⁷ *Notice of Proposed Rule Making in Docket No. 02-146*, FCC 02-180, released June 28, 2002.

for increased competition in the provision of services. It also describes OET's comprehensive review of the Commission's regulations pertaining to the allocations of non-government spectrum, the authorization of telecommunications equipment and RF-regulated devices and industrial, scientific and medical equipment, and the administration of the Experimental Radio Service. The staff recommends that the Commission make the reinvigoration and conclusion of its *Secondary Markets* proceeding a significant priority. The staff otherwise determines that the rules within its purview that apply to the operations or activities of telecommunications service providers cannot be found to be no longer necessary in the public interest as the result of meaningful economic competition, and thus are not subject to revision pursuant to the Section 11 review. Comments received regarding other aspects of our rules will be considered in other proceedings, as appropriate.

APPENDIX: RULE PART ANALYSIS (OET)

PART 2, SUBPART A - TERMINOLOGY

Description

Sections 302 and 303(e) of the Communications Act of 1934, as amended, authorize the Commission to regulate radio devices.

Purpose

This subpart provides definitive terms and definitions for words and phrases used throughout the Commission's rules.

Analysis

Status of Competition

There are no competitive considerations related to the terms and definitions in this subpart.

Advantages

This rule part provides for a common understanding and interpretation of technical and administrative terms and words of art use in the Commission's rules.

Disadvantages

None.

Comments

There were no comments received regarding this subpart.

Recommendation

These rules serve a public interest purpose because they provide for a common understanding and interpretation of technical and administrative terms and words of art used in the Commission's rules. Since these terms and definitions are competitively neutral, the question of whether they are necessary in the public interest is unaffected by the degree of meaningful economic competition between providers of telecommunications service. Thus, we cannot conclude that such regulations are no longer necessary in the public interest as the result of meaningful economic competition.

PART 2, SUBPART B – ALLOCATION, ASSIGNMENT, AND USE OF RADIO FREQUENCIES

Description

Section 303(c) of the Communications Act of 1934, as amended, authorizes the Commission to “assign bands of frequencies to the various classes of stations.” Part 2, subpart B implements this authority and contains the Table of Allocations which identifies the services allowed in each frequency band.

Purpose

The Table of Allocations provides a basic framework for each radio service’s rules.

Analysis

Status of Competition

The status of competition cannot be summarily characterized because of the variety of services and markets affected by this part. The Commission is continually amending the Table of Allocations to provide spectrum for the expansion of existing and for new services, and for the diminution of spectrum for services which do not efficiently utilize the spectrum allocated.

Advantages

The Table of Allocations sets out what radio services are permitted in each band and the primary or secondary status of each. Users are informed of what other classes of stations may enter the band or adjacent bands and what priority exists with respect to other uses.

Disadvantages

For some new radio technologies, a two-step process is needed to implement their use: first the allocation table is amended, and then the service rules are adopted. On occasion, the Commission combines these two steps.

Comments

There were no comments received regarding the Table of Allocations and related rules.

Recommendation

The Table of Allocations and related rules continue to serve the public interest purpose of ensuring the orderly and efficient use of the spectrum by a myriad of different service providers and other users of the spectrum. While changes in the competitive landscape often requires changes in the Table, that process is ongoing. It does not, however, dictate a finding that these rules are no longer necessary in the public interest as the result of

meaningful economic competition. This Office recommends retaining the Table in its current form and continuing the present procedure of incremental change as the need arises.

PART 2, SUBPART C - EMISSIONS

Description

Sections 302 and 303(e) of the Communications Act of 1934, as amended, authorize the Commission to regulate radio devices.

Purpose

Part 2, subpart C, designates emission, modulation and transmission characteristics of radio signals and the symbology to be used to identify them, and defines and provides formulas for “occupied bandwidth” and “necessary bandwidth”.

Analysis

Status of Competition

There are no competitive considerations with regard to the rules in Part 2, subpart C.

Advantages

This rule part provides necessary definitions for common understanding of emissions and bandwidth concepts to be applied in interpreting the Commission’s rules.

Disadvantages

None

Comments

There were no comments received regarding emissions or bandwidth provisions.

Recommendation

These rules serve a public interest purpose because they provide necessary definitions for common understanding of emissions and bandwidth concepts to be applied in interpreting the Commission’s rules. Since these definitions are competitively neutral, the question of whether they are necessary in the public interest is unaffected by the degree of meaningful economic competition between providers of telecommunications service. Thus, we cannot conclude that such regulations are no longer necessary in the public interest as the result of meaningful economic competition.

PART 2, SUBPART D – CALL SIGNS AND OTHER FORMS OF IDENTIFYING RADIO TRANSMISSIONS

Description

Sections 302 and 303(e) of the Communications Act of 1934, as amended, authorize the Commission to regulate radio devices and to “assign bands of frequencies to the various classes of stations.”

Purpose

Part 2, subpart D provides a system of distinctive call signs for each domestic and international station using radio frequencies, and provides for alternative forms of identification for certain classes of stations.

Analysis

Status of Competition

There are no competitive considerations with regard to the rules in Part 2, subpart D.

Advantages

This rule part ensures that the transmission of any station using radio frequencies can be identified, in order to eliminate harmful interference and to generally enforce the applicable radio treaties, conventions, regulations, arrangements, and agreements in force.

Disadvantages

None

Comments

There were no comments received regarding call signs and alternative forms of identification.

Recommendation

These rules serve a public interest purpose because they ensure that the transmission of any station using radio frequencies can be identified, in order to eliminate harmful interference and to generally enforce the applicable radio treaties, conventions, regulations, arrangements, and agreements in force. Since these rules are competitively neutral, the question of whether they are necessary in the public interest is unaffected by the degree of meaningful economic competition between providers of telecommunications service. Thus, we cannot conclude that such regulations are no longer necessary in the public interest as the result of meaningful economic competition.

PART 2, SUBPART E – DISTRESS, DISASTER, AND EMERGENCY COMMUNICATIONS

Description

Sections 302 and 303(e) of the Communications Act of 1934, as amended, authorize the Commission to regulate radio devices, and to assign bands of frequencies to the various classes of stations.

Purpose

Part 2, subpart E provides for the priority and control of distress messages and emergency communications.

Analysis

Status of Competition

There are no competitive considerations with regard to the rules in Part 2, subpart E.

Advantages

This rule part ensures that distress messages from ships or aircraft receive priority, and provides for flexibility in frequency usage during emergencies, including implementation of requests by the armed services.

Disadvantages

Prioritizing distress signals may disrupt other communications; providing for emergency operation on unassigned frequencies may disrupt other communications.

Comments

There were no comments received regarding distress and emergency communications.

Recommendation

These rules serve a public interest purpose because they ensure that distress messages from ships or aircraft receive priority, and they provide for flexibility in frequency usage during emergencies, including implementation of requests by the armed services. These public interest benefits outweigh the disadvantages set forth above. Since the regulations in this Rule Part are competitively neutral, the question of whether they are necessary in the public interest is unaffected by the degree of meaningful economic competition between providers of telecommunications service. Thus, we cannot conclude that such regulations are no longer necessary in the public interest as the result of meaningful economic competition.

PART 2, SUBPART H – PROHIBITION AGAINST EAVESDROPPING

Description

Sections 302 and 303(e) of the Communications Act of 1934, as amended, authorize the Commission to regulate radio devices.

Purpose

Part 2, subpart H, prohibits the use of a radio device for eavesdropping private conversations, unless authorized by all of the parties in the conversation; the prohibition expressly does not apply to law enforcement officers operating under lawful authority.

Analysis

Status of Competition

There are no competitive considerations with regard to the rules in Part 2, subpart H.

Advantages

This rule part prevents eavesdropping by means of radio devices.

Disadvantages

None

Comments

There were no comments received regarding the eavesdropping prohibition.

Recommendation

This regulation serves a public interest purpose because it prevents unauthorized eavesdropping. Since this regulation is competitively neutral, the question of whether it is necessary in the public interest is unaffected by the degree of meaningful economic competition between providers of telecommunications service. Thus, we cannot conclude that such regulations are no longer necessary in the public interest as the result of meaningful economic competition.

PART 2, SUBPART I – MARKETING OF RADIOFREQUENCY DEVICES

Description

Sections 302 and 303(e) of the Communications Act of 1934, as amended, authorize the Commission to regulate radio devices.

Purpose

Part 2, subpart I, provides the equipment certification requirements for radiofrequency devices be certified prior to importation or marketing in the U.S.

Analysis

Status of Competition

There are no competitive considerations with regard to the rules in Part 2, subpart I.

Advantages

This rule part prevents a proliferation of interference by unlicensed radio devices and unintentional radiators of radiofrequency energy.

Disadvantages

These rules introduce some cost and delay into the introduction of new radiofrequency devices.

Comments

There were no comments received regarding this subpart.

Recommendation

These rules do not directly apply to the activities and operations of providers of telecommunications services. Thus, they are not within the scope of the instant Section 11 review.

PART 2, SUBPART J – EQUIPMENT AUTHORIZATION PROCEDURES

Description

Sections 302 and 303(e) of the Communications Act of 1934, as amended, authorize the Commission to regulate radio devices.

Purpose

Subpart J describes the application procedures and general technical requirements for equipment authorization.

Analysis

Status of Competition

The status of competition cannot be summarily characterized because of the variety of services and markets affected by this rule.

Advantages

This subpart delineates procedures and requirements for compliance with technical standards for radio frequency equipment, thereby promoting efficient use of radio spectrum.

Disadvantages

The requirements impose some regulatory costs on equipment manufacturers and the required approvals may slow market entry slightly.

Recent Efforts

The equipment authorization procedures have been updated to decrease the regulatory burden on classes of equipment shown to have a low risk of interference potential, by increasing the kinds of authorization that can be granted by Telecommunications Certification Bodies (TCBs) and by developing agreements by which certain equipment certifications can be recognized internationally.

Comments

Commenters have recommended minor amendments, already under consideration in an open rulemaking proceeding, to update document references and requirements for measurement facilities, and have requested that we require a U.S. presence for entities exporting to the U.S. devices that are approved under a Declaration of Conformity or a Verification. Commenters have also asserted that the Commission needs to be more consistent in the approval process applied to the measurement of Specific Absorption Rate (SAR) for devices that generate radiofrequency (RF) emissions. One commenter has argued that the Commission should reduce the SAR permitted for RF emissions from regulated devices, and that argument has been opposed by another commenter.

Recommendation

These rules do not directly apply to the activities and operations of providers of telecommunications services, and thus are not within the scope of our Section 11 review. Moreover, none of the comments received pertain to rules whose operation or purpose are affected by meaningful economic competition. We will recommend action on these comments, as appropriate, in another proceeding or proceedings.

PART 2, SUBPART K – IMPORTATION OF DEVICES CAPABLE OF CAUSING HARMFUL INTERFERENCE

Description

Sections 302 and 303(e) of the Communications Act of 1934, as amended, authorize the Commission to regulate radio devices.

Purpose

Part 2, subpart K provides for the temporary and limited importation of certain devices that would normally need an equipment authorization, for use at trade shows or for testing and developmental purposes, as well as subassemblies and certain unintentional radiators.

Analysis

Status of Competition

There are no competitive considerations with regard to the rules in Part 2, subpart K.

Advantages

This subpart provides relief for the importation of certain devices that do not pose the threat of interference for which the equipment authorization rules were promulgated.

Disadvantages

There may be some potential for interference from devices imported under this section that are not used in strict conformance with the provisions of the rules.

Comments

There were no comments received regarding this subpart.

Recommendation

These rules do not directly apply to the activities and operations of providers of telecommunications services. Thus, they are not within the scope of the instant Section 11 review.

**PART 2, SUBPART M – ADVANCE APPROVAL OF SUBSCRIPTION TV
TRANSMISSION SSSYTEMs**

Description

Sections 302 and 303(e) of the Communications Act of 1934, as amended, authorize the Commission to regulate radio devices.

Purpose

Part 2, subpart M, provides for the approval of any transmission system that will be used for providing subscription television service.

Analysis

Status of Competition

There are no competitive considerations with regard to the rules in Part 2, subpart M.

Advantages

This subpart ensures that subscription television systems will not interfere with other authorized services and devices.

Disadvantages

None.

Comments

There were no comments received regarding this subpart.

Recommendation

These regulations serve a public interest purpose because they help ensure that subscription television operations do not interfere with other licensed services and devices. Since this regulation is competitively neutral, the question of whether it is necessary in the public interest is unaffected by the degree of meaningful economic competition between providers of telecommunications service. Thus, we cannot conclude that such regulations are no longer necessary in the public interest as the result of meaningful economic competition.

**PART 2, SUBPART N – FCC PROCEDURE FOR TESTING CLASS A, B AND S
EMERGENCY POSITION INDICATING RADIOBEACONS (EPIRBS)**

Description

Sections 302 and 303(e) of the Communications Act of 1934, as amended, authorize the Commission to regulate radio devices.

Purpose

Part 2, subpart N sets out the approved procedures for testing EPIRBs.

Analysis

Status of Competition

There are no competitive considerations with regard to the rules in Part 2, subpart N.

Advantages

This subpart provides testing procedures to ensure the proper operation of EPIRBs while avoiding unintentional reception of emergency signals.

Disadvantages

None.

Comments

There were no comments received regarding this subpart.

Recommendation

These regulations serve a public interest purpose because they help ensure the proper operation of EPIRBs while avoiding unintentional reception of emergency signals. Since this regulation is competitively neutral, the question of whether it is necessary in the public interest is unaffected by the degree of meaningful economic competition between providers of telecommunications service. Thus, we cannot conclude that such regulations are no longer necessary in the public interest as the result of meaningful economic competition.

PART 5 - EXPERIMENTAL RADIO SERVICE (OTHER THAN BROADCAST)

Description

Sections 302 and 303(e) of the Communications Act of 1934, as amended, authorize the Commission to regulate radio devices.

Purpose

Part 5 provides for experimentation in the provision of radio services without causing harmful interference to existing operations. These rules generally do not directly apply to the regulated activities and operations of providers of telecommunications services, and thus are not within the purview of this biennial review, as provided by Section 11 of the Communications Act of 1934, as amended.

Analysis

Status of Competition

There are no competitive considerations in the experimental radio service.

Advantages

This rule part provides the capability for the development of new radio technologies from temporarily protected facilities which will not cause harmful interference to incumbent service providers, thereby promoting efficient use of radio spectrum.

Disadvantages

The requirements impose some restrictions and regulatory costs on parties seeking to experiment with radio technology and the required approvals may slow development slightly in some cases.

Comments

There were no comments received regarding Part 5 of the Commission's rules.

Recommendation

These rules do not directly apply to the activities and operations of providers of telecommunications services, and thus are not within the scope of our Section 11 review. The Experimental Radio Service rules can be revisited as necessary in other proceedings.

PART 15 - RADIO FREQUENCY DEVICES

Description

Section 302 of the Communications Act of 1934, as amended, authorizes the Commission to regulate devices which may interfere with radio reception and requires the Commission to adopt regulations forbidding the sale of equipment capable of intercepting domestic cellular radio telecommunications service.

Purpose

The purpose of Part 15 is to provide technical guidance regarding radio devices, including prevention of interference, prohibitions on cellular transmission and reception interception.

Analysis

Status of Competition

The markets affected by Part 15 are competitive.

Advantages

The requirements of Part 15 are competitively neutral

Disadvantages

The requirements impose some regulatory costs on equipment manufacturers and the required approvals may slow market entry slightly.

Recent Efforts

The Part 15 rules are continually revised to address evolving technology.

Comments

Commenters have urged us to harmonize our RF emissions measurement procedures with those used in other countries; to modify our equipment labeling requirements; to eliminate or modify our unique antenna requirement for digital devices; to extend our spread spectrum antenna gain factors to U-NII equipment; to generally update our rules to reflect recent decisions; to provide more flexible rules for the certification of modular transmitters; to reduce our guidelines for permissible Specific Absorption Rate (SAR); and to be more consistent in our measurement practices for SAR measurements.

Recommendations

These rules do not directly apply to the activities and operations of providers of telecommunications services, and therefore are outside the scope of our Section 11

review. Moreover, none of the comments received pertain to rules that have been affected as a result of meaningful economic competition. Additionally, most of the recommendations are already the subject of open rulemaking proceedings, and we will recommend action in those other proceedings or in new proceedings, as appropriate.

PART 18 – INDUSTRIAL, SCIENTIFIC, AND MEDICAL EQUIPMENT

Description

Section 302 of the Communications Act of 1934, as amended, authorizes the Commission to regulate devices which may interfere with radio reception.

Purpose

The purpose of Part 18 is to provide for the use of industrial, scientific, and medical equipment and appliances that utilize radiofrequency energy for nontelecommunications purposes.

Analysis

Status of Competition

The markets affected by Part 18 are competitive.

Advantages

The requirements of Part 18 prevent interference to radio services from certain nontelecommunications devices that use RF energy to perform their functions. The requirements of Part 18 are competitively neutral.

Disadvantages

The requirements impose some regulatory costs on equipment manufacturers and the required approvals may slow market entry slightly.

Recent Efforts

The Part 18 rules are periodically revised to address evolving technology.

Comments

There were no comments regarding Part 18 of the Commission's rules.

Recommendations

The Part 18 rules do not apply to the activities and operations of providers of telecommunications services, and are outside the scope of this Section 11 review.