

Before the
Federal Communications Commission
Washington, D.C. 20554

In the Matter of)
)
Amendment of the Commission's Rules) PR Docket No. 92-257
Concerning Maritime Communications) RM-7956, 8031, 8352

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FEDERAL COMMUNICATIONS COMMISSION

**THIRD REPORT AND ORDER AND
MEMORANDUM OPINION AND ORDER**

Adopted: July 6, 1998

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By the Commission:

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I. INTRODUCTION AND EXECUTIVE SUMMARY

1. In the *Second Report and Order* in this proceeding¹ the Commission adopted rules to promote operational, technical, and regulatory flexibility in the Maritime Services.² In the *Second Further Notice of Proposed Rulemaking* in this proceeding the Commission sought comment on proposals to simplify the licensing process for very high frequency (VHF) public coast stations.³ In this *Third Report and Order and Memorandum Opinion and Order*, we address the petition for reconsideration of our decisions in the *Second Report and Order* filed by WJG MariTEL (MariTEL).⁴ We also adopt rules aimed at streamlining our licensing process for VHF public coast stations. We conclude that the public interest would be served by providing licensees more flexibility in the use of maritime spectrum, while preserving this internationally-allocated radio service's core purpose of promoting the safety of life and property at sea. Moreover, we believe that these changes will (1) increase competition in the provision of telecommunications services; (2) increase the types of telecommunications services available to vessel operators; (3) promote more efficient use of maritime spectrum; (4) reduce regulatory and economic burdens on coast station licensees; and (5) allow maritime commercial mobile radio service (CMRS) providers to more quickly respond to market demand. The major rule changes we adopt today are summarized below.

- We modify our rules to adopt a geographic area licensing approach for VHF public coast stations. We designate nine licensing regions near major waterways (defined as maritime VHF Public Coast areas (VPCs)), based roughly on U.S. Coast Guard Districts, and thirty-

¹ Amendment of the Commission's Rules Concerning Maritime Communications, *Second Report and Order and Second Further Notice of Proposed Rule Making*, PR Docket No. 92-257, 12 FCC Rcd 16949 (1997) (*Second Further Notice*).

² The Maritime Services consist of the services governed by Part 80 of the Commission's Rules, and include public coast stations, private coast stations, and ship stations. See 47 C.F.R. Part 80.

³ The *Second Further Notice* also sought comment on specific proposals to simplify the regulatory treatment of high seas public coast stations and Automated Maritime Telecommunications System (AMTS) coast stations. *Second Further Notice*, 12 FCC Rcd at 17001-11. However, in light of the changes we adopt today to VHF public coast station licensing, we believe that it would be prudent to undertake a more comprehensive reexamination of the high seas and AMTS licensing schemes, particularly to determine whether the statutory objective of regulatory symmetry among CMRS providers requires the implementation of similar changes to high seas and AMTS licensing. See Omnibus Budget Reconciliation Act of 1993, Pub. L. No. 103-66, § 6002(a)(2)(A), (B), 107 Stat. 312 (largely codified at 47 U.S.C. § 332 *et seq.*); see, e.g., Revision of Part 22 and Part 90 of the Commission's Rules to Facilitate Future Development of Paging Systems, *Second Report and Order and Further Notice of Proposed Rulemaking*, WT Docket No. 96-18, 12 FCC Rcd 2732, 2737 (1997) (*Paging Second Report and Order*). Therefore, we shall defer resolution of the proposals in the *Second Further Notice* regarding high seas and AMTS spectrum. Comments filed in this proceeding regarding these proposals will become a part of the record in our comprehensive reexamination of the high seas and AMTS licensing schemes. Applications for that spectrum will be governed by current procedures, but we nonetheless note that mutually exclusive applications for high seas and AMTS public coast spectrum cannot be resolved until competitive bidding procedures are adopted for those services, and that such applications may ultimately be dismissed. See Amendment of the Commission's Rules Regarding the 37.0-38.6 GHz and 38.6-40.0 GHz Bands, *Report and Order and Second Notice of Proposed Rule Making*, ET Docket No. 95-183, 12 FCC Rcd 18600, 18641-42 (1997) (*39 GHz Report and Order*).

⁴ MariTEL Petition for Reconsideration (filed Aug. 14, 1997) (MariTEL Petition).

three inland licensing regions (defined as inland VPCs), based on Economic Areas. We authorize a single licensee for all currently unassigned VHF public correspondence channels in each licensing region in lieu of the site-based approach presently used.

- We permit the continued operation of incumbent VHF public coast station licensees and private land mobile radio (PLMR) licensees sharing maritime spectrum in inland areas. Additionally, we require incumbents and geographic licensees to afford each other interference protection.
- We adopt a substantial service construction requirement for VHF public coast station licenses and permit partitioning and disaggregation of those licenses.
- We clarify the safety watch requirements of VHF public coast station licensees.
- We adopt competitive bidding procedures to resolve mutually exclusive initial applications for VHF public coast station licenses, pursuant to Section 309(j) of the Communications Act.

2. Our decisions in this *Third Report and Order and Memorandum Opinion and Order* further our goal to improve maritime communications. In developing these new rules we are guided by several broad policy initiatives. First, we seek to establish a flexible regulatory framework that will (1) provide opportunities for continued development of competitive new services using maritime spectrum, (2) expedite market entry through streamlined licensing procedures, (3) promote technological innovation, and (4) eliminate unnecessary regulatory burdens. Second, we seek to enhance regulatory symmetry between maritime CMRS providers and other CMRS providers to ensure that market forces, and not regulatory forces, shape the development of the CMRS marketplace. Finally, we take into account the unique nature of the Maritime Services. Specifically, we note that (1) the frequencies are allocated internationally to facilitate interoperability; (2) use of maritime spectrum is subject to various statutes, treaties, and agreements; and (3) the primary purpose of these services is to provide for the safety of life and property at sea.

II. BACKGROUND

3. The Maritime Services provide for the unique distress, operational, and personal communications needs of vessels at sea and on inland waterways.⁵ Maritime frequencies are allocated internationally by the International Telecommunication Union (ITU) to facilitate interoperable radio communications among vessels of all nations and stations on land worldwide. Public coast stations, which are CMRS providers that allow ships at sea to send and receive messages and to interconnect with the public switched network, use VHF band frequencies to serve a port or coastal area.⁶

4. In November 1992, the Commission released a *Notice of Proposed Rule Making and Notice of Inquiry* in this proceeding to examine the expanding communications needs of the maritime

⁵ For a fuller description of the Maritime Services and the history of this proceeding, see *Second Further Notice*, 12 FCC Rcd at 16953-56.

⁶ See Implementation of Sections 3(n) and 332 of the Communications Act -- Regulatory Treatment of Mobile Services, *Second Report and Order*, GN Docket No. 93-252, 9 FCC Rcd 1411, 1448 (1994) (*CMRS Second Report and Order*); see also 47 C.F.R. § 20.9.

community.⁷ Based on the comments received, it released a *First Report and Order* in May 1995, adopting rules that, *inter alia*, allowed the use of maritime VHF (156-162 MHz) band public correspondence frequencies by eligible entities in the Industrial and Land Transportation (I/LT) Radio Services⁸ away from navigable waterways.⁹ Additionally, the Commission released a *Further Notice of Proposed Rule Making* in response to commenters' requests for more flexible regulatory treatment of public coast stations and enhancements in marine communications equipment.¹⁰

5. On June 26, 1997, the Commission released a *Second Report and Order and Second Further Notice of Proposed Rule Making*, in which it adopted rules to, *inter alia*, permit the automated operation of public coast stations, reduce congestion through intra-service frequency sharing and inter-service frequency sharing with PLMR licensees, and permit the use of innovative technologies (such as automatic link establishment and the expanded use of narrow-band direct-printing (NB-DP) frequencies).¹¹ The Commission also proposed rules for geographic area licensing of VHF public coast stations, and sought comment on various proposals -- including permitting partitioning¹² and disaggregation¹³ of geographic licenses, and allowing incumbent VHF public coast station licensees and PLMR licensees sharing marine spectrum in inland regions to operate indefinitely.¹⁴ In addition, it proposed competitive

⁷ Amendment of the Commission's Rules Concerning Maritime Communications, *Notice of Proposed Rule Making and Notice of Inquiry*, PR Docket No. 92-257, 7 FCC Rcd 7863 (1992) (*Notice of Inquiry*).

⁸ Part 90 of the Commission's Rules subsequently was amended to consolidate the private land mobile radio (PLMR) services into two service pools. Entities formerly eligible in any of the I/LT Radio Services are now included in the Industrial/Business Pool. 47 C.F.R. § 90.283 was amended, however, to retain the eligibility requirements originally governing the sharing of maritime frequencies by PLMR licensees. See Replacement of Part 90 by Part 88 to Revise the Private Land Mobile Radio Services and Modify the Policies Governing Them and Examination of Exclusivity and Frequency Assignments Policies of the Private Land Mobile Service, *Second Report and Order*, PR Docket No. 92-235, 12 FCC Rcd 14307 (1997) (*Refarming Second Report and Order*).

⁹ Amendment of the Commission's Rules Concerning Maritime Communications, *First Report and Order*, PR Docket No. 92-257, 10 FCC Rcd 8419, 8421-25, 8431 (1995).

¹⁰ Amendment of the Commission's Rules Concerning Maritime Communications, *Further Notice of Proposed Rule Making*, PR Docket No. 92-257, 10 FCC Rcd 5725 (1995).

¹¹ *Second Further Notice*, 12 FCC Rcd at 16951-52.

¹² "Partitioning" is the assignment of geographic portions of a geographic service area along geopolitical or other boundaries.

¹³ "Disaggregation" is the assignment of discrete portions of spectrum licensed to a geographic area licensee.

¹⁴ *Second Further Notice*, 12 FCC Rcd at 16952.

bidding rules for public coast stations.¹⁵ Seventeen comments and eight reply comments to the *Second Further Notice* were received.¹⁶

6. On August 5, 1997, shortly before the comment period for the *Second Further Notice* closed, President Clinton signed into law the Balanced Budget Act of 1997 (Balanced Budget Act).¹⁷ Section 309(j)(2) of the Communications Act formerly stated that mutually exclusive applications for initial licenses or construction permits were auctionable if the principal use of the spectrum was for subscriber-based services, and competitive bidding would promote the expressed objectives of the Act.¹⁸ We concluded under former Section 309(j)(2) that, because public coast stations are CMRS providers,¹⁹ mutually exclusive initial applications were auctionable.²⁰ This conclusion is unchanged by the Balanced Budget Act, which expanded the Commission's auction authority by amending Section 309(j) to provide that all mutually exclusive applications for initial licenses or construction permits *shall* be auctioned, with certain limited exceptions.²¹

7. While our actions in this proceeding are designed to improve maritime telecommunications, applicants should be aware that an FCC auction represents an opportunity to become an FCC licensee in this service, subject to certain conditions and regulations. The FCC does not endorse any particular services, technologies, or products, and grant of an FCC license does not guarantee business success. Applicants should perform their individual due diligence before proceeding in an auction, as they would with any new business venture.

III. DISCUSSION

A. VHF Public Coast Station Spectrum

8. There are only nine channel pairs in the 157.1875-157.4500 MHz (ship transmit) and 161.775-162.0125 MHz (coast transmit) bands assignable to VHF public coast stations for public

¹⁵ *Id.* at 17011.

¹⁶ A list of commenters is provided in Appendix A. On October 6, 1997, MariTEL filed Reply Comments, along with a Motion to Accept Late-Filed Reply Comments. See MariTEL Motion to Accept Late-Filed Reply Comments at 1. On February 26, 1998, MariTEL filed Supplemental Comments, along with a Motion to Accept Supplemental Comments. See MariTEL Motion to Accept Supplemental Comments at 1. Since MariTEL's additional comments could have been labeled as *ex parte* filings, we find no reason not to accept its Reply Comments and Supplemental Comments, and thus we grant MariTEL's motions.

¹⁷ Balanced Budget Act of 1997, Pub. L. No. 105-33, 111 Stat. 251 (1997) (Balanced Budget Act).

¹⁸ See 47 U.S.C. § 309(j) (1996).

¹⁹ CMRS *Second Report and Order*, 9 FCC Rcd at 1448.

²⁰ See Implementation of Section 309(j) of the Communications Act -- Competitive Bidding, *Second Report and Order*, 9 FCC Rcd 2348, 2356-57, on reconsideration, *Second Memorandum Opinion and Order*, 9 FCC Rcd 7245 (1994) (*Competitive Bidding Second Report and Order*).

²¹ 47 U.S.C. § 309(j) (as amended by Balanced Budget Act, § 3002).

correspondence.²² Along the Canadian border, even fewer channel pairs are available for U.S. stations.²³ Currently, these channel pairs also are assignable to I/LT users in areas removed from public coast stations and navigable waterways.²⁴

1. Geographic area licensing

9. *Proposal.* Under our current rules, the service area for VHF public coast stations is applicant-defined based on predicted signal strength over the waterway to be served.²⁵ The size of each station's service area also determines the mileage separation between co-channel assignments. Using a conservative estimate, service areas for VHF band public coast stations extend 20 to 30 miles from the transmitter. In order to establish a comprehensive and consistent regulatory approach that enhances maritime communications, in the *Second Further Notice* the Commission proposed a transition from site-specific "service area"-based licensing to licensing based on FCC-defined geographic areas.²⁶

10. *Decision.* We conclude that the public interest will best be served by a transition to geographic area licensing for VHF public coast station spectrum. This approach will facilitate the development of wide-area, multi-channel automated maritime communications systems. It also will promote regulatory symmetry between maritime licensees and other CMRS providers where geographic licensing has been introduced, consistent with the congressional directive set forth in the Omnibus Budget Reconciliation Act of 1993.²⁷ We disagree with Mobile Marine Radio, Inc. (MMR), an MF, HF, and VHF public coast station licensee, that our pursuit of this objective is futile due to the limited amount of available VHF public coast station spectrum.²⁸ We believe that CMRS licensees should be afforded regulatory symmetry wherever feasible, regardless of the amount of spectrum designated for specific CMRS uses.²⁹ In addition, we agree with MariTEL, a VHF public coast station licensee, that changing our current licensing approach in favor of geographic licensing will enable public coast station licensees to be more competitive with other CMRS providers and better serve the public.³⁰ Further, we disagree

²² 47 C.F.R. § 80.371(c).

²³ See 47 C.F.R. § 80.57. In addition, VHF Channel 88 may be authorized within 120 kilometers (75 miles) of the Canadian border on the Great Lakes, the St. Lawrence Seaway, and the Puget Sound and the Strait of Juan de Fuca and its approaches. See 47 C.F.R. § 80.371(c).

²⁴ 47 C.F.R. § 90.283(d).

²⁵ See 47 C.F.R. Part 80 Subpart P.

²⁶ *Second Further Notice*, 12 FCC Rcd at 16988.

²⁷ Omnibus Budget Reconciliation Act of 1993, Pub. L. No. 103-66, § 6002(a)(2)(A), (B), 107 Stat. 312 (largely codified at 47 U.S.C. § 332 *et seq.*); see, e.g., *Paging Second Report and Order*, 12 FCC Rcd at 2737.

²⁸ MMR Comments at 4-5.

²⁹ See Implementation of Sections 3(n) and 332 of the Communications Act -- Regulatory Treatment of Mobile Services, *Third Report and Order*, GN Docket No. 93-252, 9 FCC Rcd 7988, 8001-03 (1994), *aff'd on other grounds sub nom.* Suncom Mobile & Data, Inc. v. FCC, 87 F.3d 1386 (D.C. Cir. 1996).

³⁰ MariTEL Comments at 2.

with the contentions of MMR that geographic area licensing will undermine the essential purposes of the Maritime Services, so should be employed only in those areas where PLMR sharing is permitted.³¹ As we indicated in the *Second Further Notice*, our goal in this proceeding is to improve maritime radio in ways that take into account the unique nature of the Maritime Services, including its primary purpose of providing for safety of life and property at sea.³² We believe that the geographic licensing approach will enhance maritime communications by expediting the assignment of the remaining channel pairs and facilitating development of automated coastal systems.

11. Moreover, we are not persuaded by the concerns of UTC, the Telecommunications Association (UTC), which represents utility and pipeline companies, and the Industrial Telecommunications Association and the Council of Independent Communications Suppliers (ITA/CICS), which represent PLMR users, that geographic licensing will adversely affect PLMR incumbents' operations and access to this spectrum.³³ As discussed below, incumbents' operations will be protected under the new licensing approach. In addition, partitioning and disaggregation will be permitted, which will allow PLMR users to obtain spectrum through partitioning and disaggregation arrangements in areas beyond those in which Section 90.283 of our Rules currently allows them to be licensed.³⁴ Thus, this action will potentially increase their access to this spectrum.

2. Service areas

12. *Proposal.* The Commission proposed in the *Second Further Notice* to divide the nation -- coastline and interior -- into nine regions, based on U.S. Coast Guard Districts,³⁵ as listed below:

Proposed Regions (Coast Guard District)

Northern Atlantic (1st)	Gulf of Mexico (8th)
Mid-Atlantic (5th)	Northern Pacific (13th)
Southern Atlantic (7th)	Southern Pacific (11th)
Great Lakes (9th)	Alaska (17th)
Hawaii (14th)	

The Commission sought comment on whether U.S. Coast Guard Districts provide an appropriate basis for defining service areas for the VHF public coast service, and asked commenters to discuss alternative service area definitions.³⁶

13. *Decision.* After reviewing the record in this proceeding and our initial proposals, we

³¹ MMR Comments at 5-8; *see also, e.g.*, Ross Comments at 8; Robert Sassaman Comments at 1.

³² *Second Further Notice*, 12 FCC Rcd at 16956.

³³ UTC Comments at 3-4; ITA/CICS Comments at 4-5; ITA/CICS Reply Comments at 2-3.

³⁴ 47 C.F.R. § 90.283.

³⁵ *See* 33 C.F.R. Part 3.

³⁶ *Second Further Notice*, 12 FCC Rcd at 16989.

believe that the best service area definition for VHF public coast station spectrum deviates slightly from our initial approach. We conclude that regions analogous to U.S. Coast Guard Districts should be the licensing areas near major waterways, but not elsewhere. We partially agree with the suggestion that we use smaller units than U.S. Coast Guard Districts, such as Rand McNally's Basic Trading Areas (BTAs) or the Commerce Department's Economic Areas (EAs),³⁷ in order to permit smaller entities to participate in auctions without having to bid for territory far exceeding their operating needs.³⁸ When we converted from site-based licensing to geographic licensing of 220-222 MHz band frequencies (the frequency band designated for auction that most closely approximates public coast VHF spectrum), we used different-sized licensing areas in order to afford licensees the opportunity to provide different types of service offerings.³⁹ The smallest licensing area we used was the EA because we believed that it best approximated the smallest area desired by the typical user.⁴⁰ Similarly, we find that EAs, as defined in Section 27.6 of our Rules,⁴¹ are appropriate licensing areas for the VHF public coast spectrum in inland areas, because they reflect urban, suburban, and rural traffic patterns, and thus approximate the smallest area desired by a typical user.⁴²

14. Yet one of our principal reasons for converting to geographic licensing is that our current licensing approach has "ma[d]e it extremely difficult for a single entity to obtain enough geographically and spectrally contiguous stations to develop an automated coastal system."⁴³ We believe that using licensing areas smaller than U.S. Coast Guard Districts in maritime areas would similarly impede the

³⁷ See 47 C.F.R. §§ 24.102, 90.7; see also *Rand McNally Commercial Atlas & Marketing Guide* 38-39 (128th ed. 1997). We have sometimes referred to EAs as Basic Economic Areas. See *Rulemaking to Amend Parts 1, 2, 21, and 25 of the Commission's Rules to Redesignate the 27.5-29.5 GHz Frequency Band, Third Notice of Proposed Rulemaking and Supplemental Tentative Decision*, CC Docket No. 92-297, 11 FCC Rcd 53, 85 (1995).

³⁸ Robert Sassaman Comments at 1; UTC Comments at 3-4. Commenters particularly object to creating just one licensing area in the Eighth U.S. Coast Guard District, which covers North Dakota, South Dakota, Wyoming, Nebraska, Iowa, Colorado, Kansas, Missouri, Kentucky, West Virginia, Tennessee, Arkansas, Oklahoma, New Mexico, Texas, Louisiana, Mississippi, Alabama, and parts of Pennsylvania, Ohio, Indiana, Illinois, Wisconsin, Minnesota, Florida, Georgia, and the Gulf of Mexico, see 33 C.F.R. § 3.40-1. ITA/CICS Comments at 4-5; Robert Sassaman Comments at 1.

³⁹ Amendment of Part 90 of the Commission's Rules to Provide for the Use of the 220-222 MHz Band by the Private Land Mobile Radio Service, *Third Report and Order and Fifth Notice of Proposed Rulemaking*, PR Docket No. 89-552, 12 FCC Rcd 10943, 10982 (1997) (*220 MHz Third Report and Order*); see Amendment of Part 90 of the Commission's Rules to Provide for the Use of the 220-222 MHz Band by the Private Land Mobile Radio Service, *Second Memorandum Opinion and Order and Third Notice of Proposed Rulemaking*, PR Docket No. 89-552, 11 FCC Rcd 188, 220 (1995), *aff'd on other grounds sub nom. Suncom Mobile & Data, Inc. v. FCC*, 87 F.3d 1386 (D.C. Cir. 1996).

⁴⁰ *220 MHz Third Report and Order*, 12 FCC Rcd at 10982.

⁴¹ 47 C.F.R. § 27.6.

⁴² Amendment of Part 90 of the Commission's Rules to Facilitate Future Development of SMR Systems in the 800 MHz Frequency Band, *Second Report and Order*, PR Docket No. 93-144, 12 FCC Rcd 19079, 19088 (1997).

⁴³ *Second Further Notice*, 12 FCC Rcd at 16988.

development of such systems.⁴⁴ Thus, we conclude that using areas analogous to U.S. Coast Guard Districts in the maritime areas is the most appropriate alternative, because, as MariTEL notes, coast station operators are required to coordinate safety communications services with the Coast Guard, and because the U.S. Coast Guard Districts reflect vessel movement patterns.⁴⁵ Thus, geographic licensees will be able to provide appropriate wide-area services to vessels, and to better compete with other CMRS providers.

15. Therefore, licensing areas identical to EAs shall be used in inland regions, but licensing areas analogous to U.S. Coast Guard Districts shall be used in maritime areas. We will distinguish between EAs that are near one or more major waterways,⁴⁶ referred to herein as maritime EAs, and those EAs no part of which is within one hundred miles of a major waterway, referred to herein as inland EAs.⁴⁷ Each inland EA will constitute a separate licensing area, or VHF Public Coast area (VPC), and VPCs consisting of a single inland EA will be known as inland VPCs.⁴⁸ This approach will more closely mirror the current nature of this service away from waterways, and will help differentiate between water and inland areas. Parties interested in bidding for new geographic area licenses will be able to choose between geographic areas near water and those that are on land. Each inland VPC shall be referred to by the name of the EA it comprises.

16. Maritime EAs, on the other hand, shall be grouped into larger VPCs, known as maritime VPCs. The maritime VPC boundaries will correspond roughly to U.S. Coast Guard District boundaries, thus providing, along major waterways, the benefits of wide-area licensing by U.S. Coast Guard District. In addition, maritime EAs straddling U.S. Coast Guard District boundaries have been assigned to the most appropriate maritime VPC.⁴⁹ We note that each maritime VPC includes the adjacent waters under the jurisdiction of the United States, because public coast service is marine-based, without distinct markets

⁴⁴ For example, we note that if we were to utilize Major Trading Areas, which are larger than EAs or BTAs, we would divide the Great Lakes and the lower Mississippi River into six licensing areas each, reducing the likelihood of there being a single licensee there.

⁴⁵ MariTEL Reply Comments at 5-6.

⁴⁶ Such EAs include those near the Atlantic Ocean; the Pacific Ocean below the Arctic Circle; the Great Lakes; the Gulf of Mexico and Gulf Intracoastal Waterway; the Mississippi River upriver to Brainerd, Minnesota; the Missouri River to Sioux City, Iowa; the Ohio River to Pittsburgh, Pennsylvania; the Tennessee River to Knoxville, Tennessee; the Arkansas River to Tulsa, Oklahoma; the Red River to Fulton, Arkansas; and the Columbia River to Richland, Washington. These are the chief navigable rivers in the United States. See *Webster's New Geographical Dictionary* 1191, 1247 (1977).

⁴⁷ Cf. 47 C.F.R. § 90.283 (defining inland areas where I/LT sharing is permitted as beginning 72-116 miles from navigable waterways, depending on the I/LT station's power and antenna height).

⁴⁸ Licensing by inland EAs will reduce the size of the geographic service area corresponding to the Eighth U.S. Coast Guard District, as the commenters requested. Of the 93 EAs located entirely or mostly in the Eighth District, 21 are inland EAs. Inland EAs constitute all of Montana, Wyoming, Nevada, Utah, Colorado, New Mexico; most of Arizona, Idaho, North Dakota, and South Dakota; and part of Oregon, California, Nebraska, Kansas, Oklahoma, Texas, and Minnesota. See Appendix D.

⁴⁹ Information regarding the VPCs and their constituent EAs is set forth in Appendix D and in 47 C.F.R. § 80.371(c), as amended herein.

for land and marine customers.⁵⁰ The maritime VPCs will be referred to by the titles set forth in the table above (*see* paragraph 12), except that the maritime VPC analogous to the Eighth Coast Guard District shall be referred to as the Mississippi River VPC.

3. Treatment of incumbent licensees

17. *Proposal.* The Commission proposed in the *Second Further Notice* that each incumbent maritime licensee, including PLMR licensees, be permitted to continue operating pursuant to its current station license.⁵¹ It proposed to require the new geographic area licensees to afford interference protection in accord with Section 80.773 of our Rules.⁵² Section 80.773 specifies a 12 dB ratio of desired to undesired signal strength within the incumbent's service area as the criterion for VHF public coast station co-channel interference protection.⁵³ In turn, the Commission proposed to allow each incumbent licensee to renew, transfer, assign, or modify its license only to the extent that it did not extend its service area or spectrum allotment.⁵⁴ Finally, it proposed that modifications that would extend an incumbent's service area or use additional frequencies would be contingent upon an agreement with each affected geographic area licensee.⁵⁵ The Commission sought comment from both the maritime and PLMR communities concerning the general treatment of incumbent licensees, the appropriate interference protection criteria, and whether mobile-to-mobile communications should be permitted.⁵⁶

18. *Decision.* We conclude that allowing incumbent licensees (including I/LT users and other PLMR licensees operating on this spectrum pursuant to waivers) to continue operating under the terms of their current station licenses will further the public interest by avoiding interruption of the services they provide.⁵⁷ We agree, however, with the commenters that oppose using Section 80.773 for all types of incumbent.⁵⁸ Therefore, we will require geographic area licensees to afford incumbent coast station licensees co-channel interference protection in accord with Section 80.773 of our Rules, but co-channel interference protection for I/LT and other PLMR incumbents shall be based on the standard for SMR services in the 220-222 MHz band.⁵⁹ This alternative resembles the proposal of ITA/CICS and UTC that the Commission afford incumbent PLMR users the interference protection provided for in the rules

⁵⁰ See MariTEL Comments at 8-9; Orion Comments at 2.

⁵¹ *Second Further Notice*, 12 FCC Rcd 16989-90.

⁵² 47 C.F.R. § 80.773.

⁵³ *Second Further Notice*, 12 FCC Rcd 16989-90.

⁵⁴ *Id.*

⁵⁵ *Id.*

⁵⁶ *Id.* at 16990.

⁵⁷ See APCO Comments at 2 n.1.

⁵⁸ See, e.g., MariTEL Comments at 5.

⁵⁹ See 47 C.F.R. §§ 90.723(i), 90.763(b)(1)(i).

applicable to the PLMR users' various services.⁶⁰ That precise proposal cannot be adopted, however, because PLMR licensees use these frequencies only on a shared basis, so no protection standard currently exists.⁶¹ With respect to the particular standard, then, we conclude that the same 12 dB desired to undesired signal strength standard as Section 80.773 provides for VHF public coast stations should be used for incumbent public coast station operations, while incumbent PLMR operations will receive at least 10 dB protection to their 38 dBu contours.

19. While we will not require that incumbents provide a map of their coverage areas in order to be entitled to interference protection, as proposed by MariTEL, we nonetheless note that the protection afforded to incumbent licensees will be dependent upon the technical information on file with the Commission, from which the geographic area licensees will be able to determine the appropriate level of co-channel interference protection.⁶² We encourage incumbents to verify the information in our database concerning their operations in advance of the auction to ensure that their existing operations are in accordance with their station authorizations.

20. We also conclude that incumbents should be prohibited from renewing, transferring, assigning, or modifying their licenses in any manner that extends their service area or results in their acquiring additional frequencies, without the consent of each affected geographic area licensee. We reject MMR's proposal to allow incumbent public coast station licensees to expand their systems, both geographically and by additional frequencies, before the commencement of geographic area licensing.⁶³ Similarly, we disagree with MariTEL's suggestion that we permit such expansion by incumbents on the condition that such operations cease if the incumbent does not acquire the geographic area license including the subject service area, or make suitable arrangements with the geographic area licensee.⁶⁴ We believe that permitting such incumbent expansion, whether permanently or conditionally, would undermine implementation of and a smooth transition to the geographic licensing approach we adopt today.⁶⁵ In addition, conditional expansion would not be in the public interest because users would not have certainty as to whether service would continue. Moreover, our treatment of incumbents here is consistent with our approach in other CMRS contexts where we have transitioned to geographic area licensing.⁶⁶

21. We also disagree with MariTEL's assertion that existing licensees providing contiguous coverage on a given channel pair should be permitted to obtain a combined authorization for that coverage

⁶⁰ ITA/CICS Comments at 6-7; UTC Comments at 5.

⁶¹ See 47 C.F.R. § 90.173(a).

⁶² MariTEL Comments at 6.

⁶³ MMR Comments at 9; see also Robert Sassaman Comments at 1-2.

⁶⁴ MariTEL Reply Comments at 8.

⁶⁵ The auction of public coast station geographic licenses is scheduled for the fourth quarter of this year. See FCC Announces Spectrum Auction Schedule for 1998, Public Notice No. DA 97-2497, at 3 (released Nov. 25, 1997).

⁶⁶ See Amendment of Part 90 of the Commission's Rules to Facilitate Future Development of SMR Systems in the 800 MHz Frequency Band, *First Report and Order, Eighth Report and Order, and Second Further Notice of Proposed Rulemaking*, 11 FCC Rcd 1463, 1513-14 (1995), *aff'd on other grounds sub nom. Chadmoore Communications, Inc. v. FCC*, 113 F.3d 235 (D.C. Cir. 1997) (*800 MHz SMR Order*).

area, which would enable an incumbent to relocate its facilities within its combined coverage area for that channel pair without making arrangements with the geographic area licensee.⁶⁷ The proposal, which is based on a similar provision for 800 MHz Specialized Mobile Radio (SMR) incumbents, is unsuited to the public coast service.⁶⁸ Unlike 800 MHz SMR, public coast station licensees with contiguous stations do not use the same channel pairs at each site, so the proposal would require the issuance of a different combined license for each channel pair.⁶⁹ Also, unlike SMR systems, which serve land areas, public coast station systems are unlikely to have "dead spots" completely surrounded by facilities licensed to the same operator on the same frequency, so a primary reason for granting such licenses to SMR operators is not present in the public coast service.⁷⁰ Finally, we already have granted MariTEL the siting flexibility it seeks: incumbents will have the right to renew, transfer, assign, or modify a license in a manner that does not extend the licensee's service area or acquire additional frequencies. Thus, even without the procedure requested by MariTEL, incumbents may add, modify, relocate, or eliminate facilities within their combined contour for a given channel pair, provided they do not expand their current service areas or obtain additional frequencies.

22. We nevertheless recognize that maintaining records for a large number of separate call signs for one regional system can be burdensome. For example, multiple call signs can require multiple modification requests and staggered renewal applications. We have granted waivers to consolidate multiple facilities within a single system under a single license with a single call sign in the past, and we will, after the close of the auction for geographic area licenses, entertain modification requests to this effect from incumbents. To avoid manipulation and evasion of construction and renewal requirements, such consolidated licenses ordinarily will expire on the expiration date of the earliest-to-expire site license.

23. Finally, we are not persuaded that MariTEL's proposal to permit mobile-to-mobile communications in coastal areas⁷¹ is appropriate at this time, because the record contains insufficient information regarding channel capacity and co-channel interference protection. We also are concerned that permitting mobile-to-mobile communication may impair the Maritime Services' safety functions.⁷²

4. Licensing

24. *Proposal.* The Commission proposed in the *Second Further Notice* to authorize a single

⁶⁷ MariTEL Comments at 4.

⁶⁸ 47 C.F.R. § 90.693(a).

⁶⁹ MariTEL's Maryland operations provide an example. MariTEL's Baltimore station operates on Channels 25 and 28, but its Cambridge station operates only on Channel 28. The Cambridge station's service area overlaps the Baltimore station's service area. The service area of MariTEL's Point Lookout Ridge facility, which operates on Channel 25, overlaps the Cambridge service area and a small part of the Baltimore service area. Thus, the three stations would need a Channel 25 combined license and a Channel 28 combined license, because the two combined contours differ.

⁷⁰ See *800 MHz SMR Order*, 11 FCC Rcd at 1514-1515.

⁷¹ MariTEL Comments at 6-7.

⁷² Cf. Amendment of Subparts A and E of Part 95 to Improve the General Mobile Radio Service (GMRS), *Report and Order*, PR Docket No. 87-265, 3 FCC Rcd 6554, 6560 (1988).

licensee to operate on all unassigned VHF public correspondence frequencies within a geographic area for a ten-year license term.⁷³ It also proposed to permit each geographic area licensee to place stations anywhere within its geographic area to serve vessels or units on land, so long as marine-originating traffic is given priority and incumbent operations are protected.⁷⁴ The Commission proposed that, with certain exceptions, base stations and land units be blanket licensed under the geographic area license.⁷⁵ It also proposed that the spectrum authorized to an incumbent that fails to construct, discontinues operations, or otherwise has its license terminated by the Commission would automatically revert to the geographic licensee, and that the Commission would presume a negotiated assignment or transfer of an incumbent station to a geographic area licensee to be in the public interest.⁷⁶ Finally, the Commission proposed to use the current rules regarding VHF public coast operations to define a licensee's permissible field strength at its service area boundaries; and to authorize the use of VHF public coast spectrum in waterways near Canada pursuant to coordination with Industry Canada,⁷⁷ as outlined in the Canada/U.S.A. channel agreements.⁷⁸ The Commission also sought comment on whether to take any steps to facilitate use of this spectrum by public safety entities.⁷⁹

25. *Decision.* We conclude that authorizing a single geographic area licensee to operate on all unassigned VHF public correspondence frequencies within the defined service areas for a ten-year license term will further the public interest and the goals underlying this proceeding. Contrary to Murray Cohen's contention,⁸⁰ we believe that multiple public coast station licensees in the same area are not necessary to foster competition, because, as MariTEL notes, vessel operators operating along the coast already have a variety of CMRS providers from which to select.⁸¹ Thus, we conclude that the level of competition will not be adversely affected by authorizing a single geographic licensee. In fact, we believe that competition in the maritime market will be fostered because such licensee will be better able to expand its service offerings and establish an automated system. Each geographic licensee will be permitted to place stations anywhere within its region, on land or water, and to serve vessels or units on land provided that marine-originating traffic is given priority and incumbent operations are protected. This increased flexibility will enable licensees to serve additional markets and will promote the delivery of innovative telecommunications services, while preserving service that protects the safety of life and property at sea.

26. We also conclude that the geographic license will constitute a blanket authorization for

⁷³ *Second Further Notice*, 12 FCC Rcd at 16991-92.

⁷⁴ *Id.*

⁷⁵ 47 C.F.R. § 80.21.

⁷⁶ *Second Further Notice*, 12 FCC Rcd at 16992.

⁷⁷ *Id.* at 16993.

⁷⁸ 47 C.F.R. § 80.57.

⁷⁹ *Second Further Notice*, 12 FCC Rcd at 16993.

⁸⁰ Murray Cohen Comments at 1.

⁸¹ MariTEL Reply Comments at 4-5.

both base stations and land units. However, geographic area licensees will be required to individually license any base station that requires an Environmental Assessment pursuant to Section 1.1307 of the Commission's Rules or international coordination, or would affect the radio frequency quiet zones described in Section 80.21 of the Commission's Rules. This simplified approach toward initial licensing and subsequent system modification is consistent with the approach we have taken for geographic area licensing in other wireless services.⁸² In addition, we believe that such an approach will increase operational flexibility (resulting in faster, more responsive service to the public) while reducing administrative burdens on both licensees and the Commission. If an incumbent fails to construct, discontinues operations, or otherwise has its license terminated by the Commission, the spectrum covered by the incumbent's authorization will automatically revert to the geographic area licensee (even in a geographic area partitioned by the licensee, unless the partitioning agreement provides otherwise), except for spectrum set aside for public safety use.⁸³ If a licensee negotiates to acquire an incumbent station by assignment or transfer, the assignment or transfer will be presumed to be in the public interest.⁸⁴ This will assist geographic licensees in consolidating spectrum, and give them greater flexibility in managing the spectrum and establishing coastal and wide-area systems.

27. MariTEL, in its petition for reconsideration of the *Second Report and Order*, proposes that VHF public coast station and Automated Maritime Telecommunications System (AMTS) coast station licensees and applicants intending to serve units on land be required to submit plans demonstrating how they will afford priority to maritime communications.⁸⁵ We agree with Fred Daniel d/b/a Orion Telecom (Orion), an AMTS station licensee, that such a requirement is not needed.⁸⁶ We believe that licensees will comply with the requirements of Section 80.123(b) of our Rules, which requires public coast stations serving stations on land to afford priority to marine-originating communications through any appropriate electrical or mechanical means.⁸⁷ If, however, our experience shows us otherwise, we reserve the right to revisit this issue.

28. Geographic licensees and incumbents will be prohibited from exceeding a field strength of +5 dBu (decibels referenced to one microvolt per meter) at their service area boundaries (unless the bordering licensee agrees to a higher field strength). Rather than extending precise VPC boundaries into the oceans, we expect adjacent VPC licensees (or their partitionees) to coordinate water-based site selection to avoid harmful interference. This approach provides licensees the ability to operate their systems up to the borders of their service areas, while also providing protection to adjacent licensees. The use of VHF public coast spectrum in areas along the Great Lakes, St. Lawrence Seaway, and the coastal waters of Washington will be authorized pursuant to coordination with Industry Canada, as outlined in the Canada/U.S.A. channel agreements set forth in Section 80.57 of the Commission's Rules.⁸⁸

⁸² See, e.g., 47 C.F.R. §§ 22.165, 101.1009(a).

⁸³ See 47 C.F.R. § 90.173(n).

⁸⁴ See 47 C.F.R. § 90.687.

⁸⁵ MariTEL Petition at 5.

⁸⁶ See Orion Petition to Deny at 3-4 (filed Sept. 9, 1997).

⁸⁷ 47 C.F.R. § 80.123(b).

⁸⁸ 47 C.F.R. § 80.57.

29. Regarding whether we should take steps to facilitate use of this spectrum by public safety entities, the Association of Public-Safety Communications Officials-International, Inc. (APCO), the frequency coordinator for the Part 90 Police, Local Government, and 800 MHz Public Safety Pool channel, and the Forestry-Conservation Communications Association (FCCA), the frequency coordinator for the Forestry-Conservation Radio Service, propose that public safety users be afforded a reasonable opportunity to seek any currently unused frequencies before any geographic area licenses are auctioned; and that extra channel pairs be excluded from auctions and be made available only to public safety entities for at least five years thereafter.⁸⁹ They state that public coast VHF spectrum is ideal for many public safety and forestry-conservation operations because it permits wide-area coverage with fewer sites than higher frequency bands.⁹⁰ In addition, this spectrum would be fully interoperable with existing public safety and forestry-conservation VHF channels.⁹¹ We note that public safety and forestry-conservation agencies need additional spectrum, but in many areas no VHF public safety or forestry-conservation spectrum is available.⁹² APCO states that giving public safety entities a priority to obtain vacant public coast VHF channels would accord with longstanding Commission policy and with the Balanced Budget Act, which requires the Commission, under certain conditions, to waive any requirement of the Communications Act or the regulations thereunder (except regulations regarding harmful interference) to permit a public safety entity to use unassigned frequencies.⁹³

30. Other commenters oppose APCO's proposal, on the grounds that these frequencies are not well-suited for use by public safety entities, because most of the available channels are in rural areas while the greatest public safety needs are in urban areas.⁹⁴ In this connection, they note⁹⁵ that 24 MHz in the 746-806 MHz band have been reallocated for public safety entities.⁹⁶ They also contend that setting maritime spectrum aside for public safety is not necessary or warranted because public coast station licensees already provide emergency communication services.⁹⁷

31. We conclude that designating two contiguous channel pairs for public safety users⁹⁸ in

⁸⁹ APCO Comments at 3-4; FCCA Comments at 2-3; *see also* State of Montana Comments at 1.

⁹⁰ APCO Comments at 2-3; FCCA Comments at 2.

⁹¹ APCO Comments at 2-3; FCCA Comments at 2.

⁹² Public Safety Wireless Advisory Comm., *Final Report* 32-33 (Sept. 1996).

⁹³ APCO Comments at 4 (citing Balanced Budget Act of 1997, § 3004 (to be codified at 47 U.S.C. § 337)).

⁹⁴ ITA/CICS Comments at 8; Coast Guard Comments at 2.

⁹⁵ MariTEL Reply Comments at 11.

⁹⁶ *See* 47 U.S.C. § 337 (as amended by Balanced Budget Act, § 3004); Reallocation of Television Channels 60-69, the 746-806 MHz Band, *Notice of Proposed Rule Making*, ET Docket No. 97-157, 12 FCC Rcd 14141, 14145 (1997).

⁹⁷ ITA/CICS Comments at 8; MariTEL Comments at 8; Ross Comments at 3-4.

⁹⁸ Public safety users are persons and entities eligible for licensing under 47 C.F.R. Part 90, Subpart B.

each inland VPC, but not in the maritime VPCs, will best further the public interest.⁹⁹ We believe that such a set-aside is not likely to adversely affect the development of new systems in these regions. We also find that allotting fewer channel pairs would be of little utility to public safety, while allotting more could leave the licensee with too little spectrum to be useful. Designating the channels in advance, and not holding any other channels aside, also avoids unnecessary delay of the auction for public coast spectrum and allows prospective bidders to have a clearer understanding of what spectrum is vacant and available. The ultimate use for these reserved frequencies, and the procedures for licensing this spectrum, shall be decided as part of our pending public safety proceeding.¹⁰⁰ We decline to set aside channel pairs in any of the larger VPCs because, due to the scarcity of spectrum, such an action, as noted by MariTEL, would make the development of wide-area coastal systems very difficult.¹⁰¹ Moreover, we believe that the public coast spectrum that we are setting aside for public safety use will sufficiently accommodate public safety needs in this band without undermining the goals underlying this proceeding and the new licensing approach we adopt today.

5. Coverage requirements

32. *Proposal.* In the *Second Further Notice*, the Commission solicited comment on an appropriate construction requirement for VHF public coast geographic area licensees.¹⁰² One option suggested was to require provision of "substantial service" to their service areas within ten years.¹⁰³ Alternatively, the Commission requested comment on subjecting geographic area licensees to the current eight-month construction requirement for public coast stations or establishing a different construction requirement, such as requiring coverage of at least twenty percent of the population or fifty percent of navigable waterways in the service area within five years.¹⁰⁴

33. *Decision.* We conclude that requiring provision of substantial service to the geographic area licensees' service areas within ten years, as proposed in the *Second Further Notice*, would not achieve our goals of promoting efficient use of the spectrum; encouraging the provision of service to rural, remote, and insular areas; and preventing the warehousing of spectrum. We remain convinced, however, that the current eight-month construction requirement, unmodified, would impose an unreasonable burden on geographic area licensees. We therefore believe it necessary to establish a construction requirement that will encourage construction and prevent spectrum warehousing while providing geographic licensees with sufficient flexibility to meet market demands for service. We agree with MMR and MariTEL that, because of the importance of public coast stations to maritime safety, the construction requirement should

⁹⁹ The channels designated in each inland VPC are set forth in Appendix E.

¹⁰⁰ See Development of Operational, Technical and Spectrum Requirements for Meeting Federal, State and Local Public Safety Agency Communication Requirements Through the Year 2010, *Second Notice of Proposed Rulemaking*, 12 FCC Rcd 17706 (1997) (*Public Safety Second NPRM*).

¹⁰¹ MariTEL Comments at 7-8.

¹⁰² *Second Further Notice*, 12 FCC Rcd at 16994-95.

¹⁰³ *Id.* "Substantial service" generally is defined as service which is sound, favorable, and substantially above a level of mediocre service which just might minimally warrant renewal. See, e.g., 47 C.F.R. § 90.816(b)(1)(i).

¹⁰⁴ *Second Further Notice*, 12 FCC Rcd at 16994-95.

not be too loose, particularly along coastlines and other "navigable waterways."¹⁰⁵ In light of the maturity of the Maritime Services along the busiest waterways, however, we do not believe that requirements as strict as they suggest are necessary.¹⁰⁶ We shall instead require substantial service within five and ten years, as described below. In addition, geographic area licensees shall be afforded a renewal expectancy when their license terms expire, provided that they demonstrate that they (1) have provided substantial service during their license term; and (2) have complied with applicable Commission rules and policies, and the Communications Act.¹⁰⁷

34. We will require maritime VPC licensees to provide substantial service within five years of initial authorization, which can be satisfied by a demonstration of coverage to one-third of the maritime VPC's major waterway(s)¹⁰⁸; and again within ten years, which can be satisfied by a demonstration of continuous coverage to two-thirds of the major waterway(s). To satisfy the requirement along a river or the Gulf Intracoastal Waterway, service should be provided across the entire width. To satisfy the requirement on other waterways, coverage should extend out 20 nautical miles¹⁰⁹ (unless limited to a smaller area by an international or VPC border) from the coastline or, where applicable, from the line established by the Coast Guard to divide inland waters from territorial seas.¹¹⁰ In maritime VPCs with more than one major waterway, the coverage refers to the total length of all major waterways; coverage need not necessarily be provided to every major waterway, or to any minimum percentage of each major waterway. These "safe-harbor" examples are intended to provide licensees a degree of certainty regarding how to comply with the substantial service requirement. The requirement can be met in other ways, which will vary depending on the market served, and we will review licensees' showings on a case-by-case basis.

35. MMR proposes to require construction of sufficient transmitters to provide service on all authorized frequencies simultaneously rather than using a frequency-agile transmitter (which MMR contends is merely a channel-warehousing device).¹¹¹ However, we agree with BR Communications (BRC), a developer of HF radio systems, which says that such a requirement "would prevent licensees from using modern broadband antennas and radio amplifiers, locking them instead into outdated, 1960's-era architecture. Moreover, it would increase dramatically the costs of placing a new coast station into

¹⁰⁵ MariTEL Comments at 9; MMR Comments at 10; *see also* ITA/CICS Comments at 10. "Navigable waters" are the territorial waters of the United States, and its internal waters that are or have been susceptible for use as highways for interstate or foreign commerce. 47 C.F.R. § 80.5.

¹⁰⁶ MMR proposes requiring service to the region's navigable waterways within one year. MMR Comments at 10. MariTEL proposes that geographic area licensees be required to construct at least ten percent of their authorized channels along eighty percent of the region's navigable waterways within one year of authorization, and fifty percent of the channels along eighty percent of the waterways within ten years. MariTEL Comments at 10.

¹⁰⁷ *See* 800 MHz SMR Order, 11 FCC Rcd at 1502.

¹⁰⁸ As defined in note 46, *supra*.

¹⁰⁹ *See* 47 C.F.R. §§ 80.225(b), 80.905(a)(1).

¹¹⁰ *See* 33 C.F.R. § 2.05-20(b), Part 80.

¹¹¹ MMR Comments at 10.

service and, as a result, would undermine the development of competition in the maritime service."¹¹² We endeavor to adopt technology-neutral policies, so licensees can choose the equipment best suited to their needs.¹¹³ We also note that no such requirement is imposed on other CMRS providers.¹¹⁴

36. We also will require inland VPC licensees to provide substantial service within five and ten years. For inland VPC licensees, substantial service can be satisfied by a demonstration of coverage to at least one-third of the population of the VPC within five years of initial authorization and at least two-thirds of the population within ten years. This is similar to the approach we adopted for geographic area licensees in the 220 MHz Service.¹¹⁵ As is the case with the maritime VPC safe-harbor examples, these safe-harbor examples are intended to provide licensees a degree of certainty regarding how to comply with the substantial service requirement. The requirement can be met in other ways, and we will review licensees' showings case by case if they rely on a different basis. Service need not be provided to waterways in the inland VPC, but if waterways are served, public coast stations' maritime obligations (e.g., safety watch and priority to marine-originating traffic) shall apply. We decline to adopt the proposal of ITA/CICS that the Commission prevent warehousing of inland spectrum by "permit[ting] the continued licensing of I/LT radio systems in the areas away from the navigable waters -- even if only on a secondary basis."¹¹⁶ We also decline to adopt their proposal that after a period of time equal to the original construction period, PLMR users licensed on a secondary basis be converted to primary status. We believe that the construction requirement is sufficient to prevent spectrum warehousing and, thus, such measures are not necessary.¹¹⁷

6. Partitioning and disaggregation

37. *Proposal.* The Commission proposed in the *Second Further Notice* to permit partitioning and disaggregation by geographic area licensees, and that such transactions would be governed by the Commission's current partial assignment procedures.¹¹⁸ The Commission proposed to allow geographic area licensees to partition and/or disaggregate geographic area and any amount of spectrum at any time

¹¹² BRC Reply Comments at 3.

¹¹³ See, e.g., Replacement of Part 90 by Part 88 to Revise the Private Land Mobile Radio Services and Modify the Policies Governing Them, *Report and Order and Further Notice of Proposed Rulemaking*, PR Docket No. 92-235, 10 FCC Rcd 10076, 10095 (1995), *on reconsideration*, *Memorandum Opinion and Order*, 11 FCC Rcd 17676 (1996) (*PLMR Report and Order*).

¹¹⁴ See, e.g., Amendment of the Commission's Rules to Establish New Personal Communications Services, *Third Report and Order*, GEN Docket No. 90-314, 9 FCC Rcd 1337, 1341, 1359-60, *on reconsideration*, *Memorandum Opinion and Order*, 9 FCC Rcd 7805 (1994), *aff'd on other grounds sub nom. Freeman Eng'g Assocs., Inc. v. FCC* 103 F.3d 169 (D.C. Cir. 1997).

¹¹⁵ See *220 MHz Third Report and Order*, 12 FCC Rcd at 11020.

¹¹⁶ ITA/CICS Comments at 10; see ITA/CICS Reply Comments at 3; see also Petition for Rule Making Submitted by the Land Mobile Communications Council, RM 9262 (filed Apr. 22, 1998) (proposing allocation of additional spectrum for PLMR use).

¹¹⁷ See also *MariTEL Reply Comments* at 12.

¹¹⁸ *Second Further Notice*, 12 FCC Rcd 16995-96.

to any entity eligible in the Maritime Services.¹¹⁹ It also proposed to permit combined partitioning and disaggregation.¹²⁰ In addition, the Commission proposed that partitionees and disaggregatees hold their licenses for the remainder of the original licensee's term and be entitled to establish a renewal expectancy.¹²¹ Finally, it proposed to apply unjust enrichment payments, including accelerated payment of any bidding credit we adopt for small businesses, as a condition for approving partitioning and disaggregation arrangements involving a complete or partial transfer of a license owned by a qualified small business to an entity that does not qualify as a small business.¹²² The Commission sought comment on these tentative conclusions, and on the respective obligations of the parties to a partitioning or disaggregation arrangement.¹²³

38. *Decision.* We conclude that public coast geographic area licensees should be permitted to partition any portion of their geographic service area, and to disaggregate any amount of spectrum, at any time to any entity eligible for a public coast station license. This approach will afford parties flexibility to pursue a variety of competitive service offerings, facilitate new market entrants, and promote delivery of quality service to the public. Moreover, contrary to Murray Cohen's assertion,¹²⁴ such approach is consistent with our action in other CMRS contexts.¹²⁵ In addition, partitionees and disaggregatees shall hold their licenses for the remainder of the original licensee's license term, and be able to qualify for a renewal expectancy, provided that they provide substantial service and comply with the Commission's rules and policies and the Communications Act. We believe that these requirements are necessary in order to prevent licensees from using partitioning and disaggregation to circumvent our rules governing license term and construction requirements, and to ensure that there will be maximum incentive for parties to pursue available spectrum as quickly as practicable.

39. Public coast station licensees will be permitted to acquire partitioned and/or disaggregated licenses in either of two ways: (1) they may form bidding consortia to participate in auctions, and then partition or disaggregate the licenses won among consortia participants after grant; or (2) they may acquire partitioned or disaggregated licenses from other licensees through private negotiation and agreement either before or after the auction. A licensee planning to partition or disaggregate its license must file an assignment application. We consider partitioning and disaggregation to be assignments of license, which will, therefore, require prior approval by the Commission. In authorizing partitioning and disaggregation arrangements, we will follow existing assignment procedures.¹²⁶ Under our current rules,¹²⁷ the licensee

¹¹⁹ *Id.* at 16996.

¹²⁰ *Id.* at 16995.

¹²¹ *Id.*

¹²² *Id.* at 16997.

¹²³ *Id.* at 16996-97.

¹²⁴ Murray Cohen Comments at 1.

¹²⁵ See *Geographic Partitioning and Spectrum Disaggregation by Commercial Radio Services Licensees, Report and Order and Further Notice of Proposed Rulemaking*, WT Docket No. 96-148, 11 FCC Rcd 21831, 21860 (1996) (*Partitioning and Disaggregation Report and Order*).

¹²⁶ See 47 C.F.R. § 1.924.

must file FCC Form 1046, Assignment of Authorization, signed by both the licensee and the qualifying entity,¹²⁸ and the qualifying entity also must file FCC Form 503, Application for Land Radio Station License in the Maritime Services.¹²⁹ We will require that a licensee disaggregate by frequency pairs. This requirement is necessary for administrative purposes: updates to the database necessary to track authorizations could otherwise become delayed or prone to error.¹³⁰

40. MariTEL argues that geographic area licensees that partition and/or disaggregate should remain ultimately responsible for satisfying their coverage requirements.¹³¹ We have determined that the public interest will be served by following the approach we have taken in other geographic licensing contexts; *i.e.* permitting licensees to negotiate which party will be responsible for meeting the applicable construction requirements.¹³² Our goal is to ensure that licensees have the flexibility to structure their business plans, while ensuring that partitioning and disaggregation not be used as a vehicle for circumventing the applicable construction requirements.

41. We will allow parties to partitioning agreements to choose between two options for satisfying the construction requirements: (a) the parties may either agree to meet the construction requirements for their respective portions of the service area; or (b) the original licensee may certify that it has met or will meet the construction requirements for the entire market. Under the first option, the partitionor and partitionee would each certify that they will independently satisfy the substantial service requirement for their respective partitioned areas. If either licensee failed to meet its substantial service showing requirement, only the non-performing licensee's renewal application would be subject to forfeiture at renewal. Under the second option, the partitionor certifies that it has met or will meet the substantial service requirement for the entire market. If the partitionor fails to meet the substantial service standard, however, only its renewal application would be subject to forfeiture at renewal. The partitionee's license would not be affected by that failure.

42. We will establish two options for disaggregating licensees. We believe that it is appropriate for the disaggregator or the disaggregatee to assume full responsibility for construction within the shared service area, because service would be offered over the relevant population, even if not on the entire spectrum. Under the first option, the disaggregator and disaggregatee would certify that they each

¹²⁷ We have adopted a Notice of Proposed Rulemaking proposing a Universal Licensing System (ULS) for wireless applications. Biennial Regulatory Review -- Amendment of Parts 0, 1, 13, 22, 24, 26, 27, 80, 87, 90, 95, 97, and 101 of the Commission's Rules to Facilitate the Development and Use of the Universal Licensing System in the Wireless Telecommunications Services, *Notice of Proposed Rulemaking*, WT Docket No. 98-20, FCC 98-3 (released Mar. 18, 1998). If the ULS rules are adopted as proposed, FCC Form 603 will be used for requesting approval of assignment of licenses, including partitioning and disaggregation requests.

¹²⁸ 47 C.F.R. § 80.19.

¹²⁹ 47 C.F.R. § 1.924(b)(2)(iv). If the ULS rules are adopted as proposed, *see supra* note 127, FCC Schedule G will be used for requesting public coast station licenses.

¹³⁰ *See 39 GHz Report and Order*, 12 FCC Rcd at 18635; *Partitioning and Disaggregation Report and Order*, 11 FCC Rcd at 21858.

¹³¹ MariTEL Comments at 11.

¹³² *See Partitioning and Disaggregation Report and Order*, 11 FCC Rcd at 21857.

will share responsibility for meeting the substantial service requirement for the geographic service area. If parties choose this option and either party fails to do so, both licenses would be subject to forfeiture at renewal. The second option would allow the parties to agree that either the disaggregator or the disaggregatee would be responsible for meeting the substantial service requirement for the geographic service area. If parties choose this option, and the party responsible for meeting the construction requirement fails to do so, only the license of the nonperforming party would be subject to forfeiture at renewal.

43. We no longer need to establish a separate unjust enrichment requirement for approving partitioning and disaggregation in the public coast service, because we have in another proceeding adopted a uniform requirement in Part 1 of our Rules for all services.¹³³ The unjust enrichment provisions adopted therein will also apply to VHF public coast geographic licensees that are afforded a bidding credit and later elect to partition or disaggregate their licenses.

7. Technical flexibility

44. *Proposal.* As the Commission noted in the *Second Further Notice*, the basic channelization for VHF public coast spectrum is set forth in the ITU Radio Regulations as 25 kHz.¹³⁴ However, AMTS coast stations (216-220 MHz) are permitted the flexibility to use narrowband technologies in addition to the 25 kHz channel plan set forth in our rules.¹³⁵ The Commission proposed in the *Second Further Notice* that each geographic area licensee, as well as incumbent licensees, be authorized to use narrowband technologies in the same manner as AMTS coast stations.¹³⁶

45. *Decision.* We conclude that public coast licensees should be permitted to use frequencies offset 12.5 kHz from the marine VHF band (156-162 MHz) public correspondence channels where they are authorized on both adjacent frequencies, and, as suggested by Murray Cohen,¹³⁷ where the licensee on the other side of the offset frequency consents to such use. After the close of the comment period in this proceeding, the 1997 World Radiocommunication Conference (WRC-97) authorized the use of 12.5 kHz narrowband channels to reduce local congestion,¹³⁸ so we adopt that narrowband channelization plan, in lieu of our proposal to not specify a plan.¹³⁹ The WRC-97 action also resolves the objections of the Coast Guard and Ross Engineering (Ross), a manufacturer of marine radio equipment and provider of VHF radio services, against authorizing narrowband technology without an international consensus. Those

¹³³ See Amendment of Part 1 of the Commission's Rules -- Competitive Bidding, *Third Report and Order and Second Further Notice of Proposed Rule Making*, WT Docket No. 97-82, 13 FCC Rcd 374, 405 (1997) (*Part 1 Third Report and Order*); see also 47 C.F.R. § 1.2111(c).

¹³⁴ *Second Further Notice*, 12 FCC Rcd at 16997.

¹³⁵ See 47 C.F.R. § 80.385(b).

¹³⁶ *Second Further Notice*, 12 FCC Rcd at 16998.

¹³⁷ Murray Cohen Comments at 1.

¹³⁸ See *Final Acts of the World Radiocommunication Conference (WRC-97)*, Geneva, 1997 (amending ITU Radio Regulations Art. S52, App. S18 n.e).

¹³⁹ *Second Further Notice*, 12 FCC Rcd at 16998.

commenters also oppose the use of offset channels because, among other reasons, they see no need for the additional channels, and no Part 80 12.5 kHz equipment has been type accepted.¹⁴⁰ We agree with MariTEL and MMR that additional channels are needed because without narrowband channel pairs, public coast licensees will be hampered in their efforts to compete effectively with other CMRS providers. We also are not persuaded that the lack of type accepted equipment is a sufficient reason not to adopt our proposal. In fact, the Commission has previously adopted regulations permitting the use of equipment for which there is not yet type acceptance.¹⁴¹

46. In addition to commenting on our proposal in the *Second Further Notice*, the Coast Guard filed a petition for rulemaking, which we elected to treat as a comment in this proceeding.¹⁴² The Coast Guard requests that we amend Part 80 of our Rules to set aside duplex channel pairs offset 12.5 kHz from the marine VHF band public correspondence channels, and marine VHF Channel 228B (162.0125 MHz).¹⁴³ In those areas where Channel 88 is available to maritime users,¹⁴⁴ Channel 228B is a VHF public correspondence narrowband frequency; in other areas, Channel 228B is a federal government frequency.¹⁴⁵ The Coast Guard proposes that these channels be used for Automatic Identification Systems (AIS) and related safety systems, in support of its Ports and Waterways Safety System (PAWSS) project, which will provide Vessel Traffic Services (VTS) to facilitate the safe and efficient transit of vessel traffic to prevent collisions, groundings, and environmental damage associated with maritime accidents.¹⁴⁶ Specifically, the Coast Guard, supported by Ross and others,¹⁴⁷ proposes that the channels be used on a shared, need-determined basis with VHF public coast stations, and that at least two of the eight offset channels available nationwide, plus Channel 228B, be reserved in any given geographic area for such use.¹⁴⁸ MariTEL proposes awarding the offset frequencies to VHF public coast spectrum licensees initially, but on the condition that the Commission can later designate such channels for AIS use.¹⁴⁹

¹⁴⁰ Coast Guard Comments at 5; Ross Comments at 5-7; Ross Reply Comments at 2-3.

¹⁴¹ MariTEL Comments at 12; MariTEL Reply Comments at 12-14; MMR Comments at 9.

¹⁴² See Letter from David E. Horowitz, Chief, Public Safety and Private Wireless Division, Wireless Telecommunications Bureau, to J.D. Hersey, Jr., Chief, Spectrum Management Division, United States Coast Guard (August 29, 1997). Orion opposes addressing the petition in this proceeding, on the grounds that the issues raised therein should not delay enactment of the proposals in the *Second Further Notice*. Orion Petition to Set Aside at 2 (filed Sept. 9, 1997); see also MariTEL Reply Comments at 14-16. Because our consideration of the Coast Guard Petition did not delay the release of this *Third Report and Order*, the Petition to Set Aside is denied. Cf. *Public Safety Second NPRM*, 12 FCC Rcd at 17785.

¹⁴³ Coast Guard Petition for Rule Making at 2-3 (filed Aug. 4, 1997) (Coast Guard Petition).

¹⁴⁴ See 47 C.F.R. § 80.57.

¹⁴⁵ See 47 C.F.R. § 2.106 n.G5.

¹⁴⁶ Coast Guard Petition at 1.

¹⁴⁷ Ross Comments at 2-3; Ross Reply Comments at 1-2; Robert Sassaman Comments at 2; American Waterways Operators Comments at 1.

¹⁴⁸ Coast Guard Petition at 2, 7.

¹⁴⁹ MariTEL Supplemental Comments at 2-3.

47. We believe that three subsequent developments must be considered in connection with the Coast Guard's proposal. First, the Department of Transportation appropriation for fiscal year 1998 contains funding for the PAWSS project, with both houses of Congress expressing strong support for the Coast Guard's efforts.¹⁵⁰ As the House report stated,

[AIS] technology should be the foundation of any future VTS system. The AIS technology employs on-board transponders, electronic charts, and Differential Global Positioning System technology to provide direct, vessel-to-vessel, voiceless electronic data communications. The Committee strongly believes that this technology will significantly improve navigational safety, not just in select VTS target ports, but throughout the navigable waters of the United States. The Committee encourages the Coast Guard to continue working with its PAWSS stakeholders, during the development and implementation of this national system, to ensure that it provides the greatest amount of navigational and environmental safety for the broadest geographical area at the lowest cost to the American taxpayers.¹⁵¹

Second, the Interdepartment Radio Advisory Committee (IRAC)¹⁵² approved the Coast Guard's request to use Channel 228B in those areas where it is allocated to the federal government. Finally, WRC-97 set aside Channels 87B (161.975 MHz) and 88B (162.025 MHz) for AIS, but provided that, where those frequencies are unavailable, other frequencies may be used.¹⁵³ Channel 87 (including Channel 87B) is currently allocated to VHF public correspondence,¹⁵⁴ and Channel 88B is allocated to Government non-military agencies.¹⁵⁵

48. We conclude that the Coast Guard request should be granted, and two channel pairs (plus Channel 228B, where it is a maritime frequency) should be set aside in each maritime VPC for AIS. We believe that setting aside these frequencies for this purpose will enhance the safety of life and property on vessels in United States waters by reducing collisions, groundings, and environmental harm,¹⁵⁶ further effectuating our regulatory goal of fostering the protection of life and property at sea through the use of maritime radio spectrum. While we considered setting aside Channel 87B as one of the AIS channels, we conclude that the public interest benefits flowing from such an approach are minimal as compared to the potential adverse impact on our licensing of public coast stations. First, setting aside Channel 87B

¹⁵⁰ See H.R. Rep. No. 236, 105th Cong., 1st Sess. (1997); S. Rep. No. 55, 105th Cong., 1st Sess. (1997); H.R. Rep. No. 188, 105th Cong., 1st Sess. (1997).

¹⁵¹ H.R. Rep. No. 236, 105th Cong., 1st Sess. (1997).

¹⁵² IRAC is responsible for frequency coordination efforts on behalf of the federal government, and is composed of representatives from various government agencies. In this connection, IRAC advises the National Telecommunication and Information Administration concerning spectrum management issues and coordinates spectrum issues among government users and with the Commission.

¹⁵³ See *Final Acts of WRC-97* (amending ITU Radio Regulations App. S18 n.l.).

¹⁵⁴ 47 C.F.R. § 80.371(c).

¹⁵⁵ 47 C.F.R. § 2.106 n.G5.

¹⁵⁶ See 47 C.F.R. § 80.5.

as an AIS channel would require relocation of the thirty-four public coast stations currently authorized to use Channel 87. Second, we believe that setting aside one broadband channel and one narrowband channel for AIS might complicate AIS implementation or raise the cost of the necessary equipment. Third, this approach would encumber one broadband channel and three narrowband channels, instead of encumbering two narrowband channels as proposed by the Coast Guard, because setting aside Channel 87B would leave the surrounding narrowband channels unavailable. Finally, setting aside Channel 87B would harm maritime VPC licensees' ability to construct wide-area systems by leaving most with no more than eight broadband channels. Thus, we will not designate Channel 87B as an AIS channel.

49. Instead of selecting the channel pairs for an AIS set-aside, we believe the most prudent course of action in furtherance of the public interest would be for the Coast Guard to negotiate with each individual maritime VPC licensee to select narrowband frequencies for AIS use. Within six months of the conclusion of the auction, we will require that the Coast Guard and each maritime VPC licensee begin to negotiate a plan specifying narrowband duplex channel pairs within the maritime VPC (including areas beyond the major waterways). The Coast Guard proposal should specify which frequencies, up to two, the Coast Guard seeks. We note the possibility that the channels need not be the same throughout the maritime VPC. If the maritime VPC licensee objects to the Coast Guard proposal, it shall make a counterproposal within three months of receipt of the Coast Guard's plan. The final agreement shall set aside up to two channel pairs throughout the maritime VPC, or implement whatever other arrangement is amenable to both parties (e.g., more than two channel pairs in some places, and one or no channel pairs elsewhere). If good faith negotiations yield no agreement within one year of the date the Coast Guard submitted its initial proposal, the Coast Guard may ask the Commission to revisit this issue and select the channels and locations. We prefer this procedure to setting channels aside in advance because we believe that it will allow the Coast Guard time to develop its AIS plans fully and coordinate AIS frequencies with neighboring countries.¹⁵⁷ We also believe that such approach will enhance each maritime VPC licensee's ability to pursue its own business plan and allow the parties to determine how many channels are needed in each location. In addition, this approach avoids the problems associated with uniformly setting aside Channel 87B, discussed above.

50. Finally, in its petition for reconsideration of the *Second Report and Order*, MariTEL contends that the Commission erred in declining to adopt rules regarding maritime sharing of land mobile frequencies,¹⁵⁸ and argues that such rules could be adopted now and held in abeyance pending developments in other proceedings.¹⁵⁹ However, the continued validity of one of the premises of that sharing proposal¹⁶⁰ -- that few PLMR licensees operate within 80 kilometers of the United States coastline¹⁶¹ -- is questionable in light of our decision to consolidate the PLMR services in an effort to introduce more flexibility.¹⁶² Moreover, we believe that going forward with a sharing proposal could

¹⁵⁷ Because the United States will not be using the AIS channels designated by the ITU, the Coast Guard will need to inform foreign ships of the applicable AIS channels in each region.

¹⁵⁸ *Second Report and Order*, 12 FCC Rcd at 16986.

¹⁵⁹ MariTEL Petition for Reconsideration at 5-6.

¹⁶⁰ *Second Report and Order*, 12 FCC Rcd at 16986.

¹⁶¹ *Notice of Inquiry*, 7 FCC Rcd at 7868.

¹⁶² *Refarming Second Report and Order*, 12 FCC Rcd at 14317-18.