

BEFORE THE  
**Federal Communications Commission**

WASHINGTON, D.C. 20554

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FEDERAL COMMUNICATIONS COMMISSION  
OFFICE OF THE SECRETARY

In the Matter of )  
)  
Redevelopment of Spectrum to ) ET Docket No. 92-9  
Encourage Innovation in the Use )  
of New Telecommunications ) RM-7981  
Technologies ) RM-8004

To: The Commission

REPLY COMMENTS OF  
THE AMERICAN PETROLEUM INSTITUTE

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TABLE OF CONTENTS

SUMMARY . . . . .	ii
I. INTRODUCTION . . . . .	1
II. REPLY COMMENTS . . . . .	3
A. The Commission Must Adopt a Transition Period Which Will Ensure Adequate Planning and Preparation for Non- Disruptive Migration of Incumbent Licensees . . . . .	4
B. The Commission Must Ensure that Replacement Spectrum and/or Technologies are Comparable and that Adequate Migration Compensation is Available to Displaced Licensees . . . . .	10
C. Arbitration and/or Mediation Will Provide the Best Means of Dispute Resolution . . . . .	12
D. Spectrum from the Federal Government 2 GHz Band Must be Made Available to All Displaced Incumbents on an Equal Eligibility Basis . . . . .	14
III. CONCLUSION . . . . .	16

## SUMMARY

In order to ensure that vital services to the public are not disrupted, the Commission must adopt a minimum five year period during which voluntary negotiations may take place between perspective new technology service providers and incumbent 2 GHz private microwave licensees. Activities surrounding replacement of microwave paths in complex microwave systems will be time consuming. The Commission should not force parties into mandatory relocation procedures prematurely, but should allow market mechanisms to operate for a reasonable amount of time to ensure as smooth a transition as possible. Indeed, even those parties with an interest in the deployment of PCS and other new spectrum technologies admit that a significant period of time will be needed to ensure trouble free hand-off.

The American Petroleum Institute (API) also urges the agency not to create unnecessary dislocations by adopting a premature "trigger date" for the beginning of the voluntary negotiation period. API urges the Commission to defer commencement of the transition period until the agency begins granting authorizations to construct new technology systems. In fact, a staggered transition start date system operating on a market-by-market basis is a workable and equitable solution for starting the transition clock.

API urges the Commission to take steps to ensure that displaced 2 GHz private microwave users receive comparable replacement facilities and are fully compensated for the cost of the transition. API believes that most issues of comparability and reliability may be successfully negotiated among the parties privately, without the necessity for commitment of Commission resources. Comparability must encompass all aspects of system performance, taking into account reliability, carriage capacity, data speed and throughput, bandwidth and the total efficiency of the replacement facilities. In the event of disagreements over comparability issues and/or migration costs, the Commission should allow mediation and/or arbitration to be employed to resolve such disputes. This will minimize the drain on agency resources. Finally, spectrum from the federal government 2 GHz band must be made available to all displaced incumbents on an equal eligibility basis.

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**REPLY COMMENTS OF  
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The American Petroleum Institute ("API"), by its attorneys, pursuant to the invitation extended by the Federal Communications Commission ("FCC," "Commission" or "Agency") in its First Report and Order and Third Notice of Proposed Rule Making ("Third Notice")<sup>1/</sup> in the above-referenced proceeding, respectfully submits the following Reply Comments for consideration by the Commission.

**I. INTRODUCTION**

1. API filed Comments in this proceeding on January 13, 1993. Those Comments explained that API does not object to Commission efforts to foster the development

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<sup>1/</sup> 7 FCC Rcd 6886 (1992).

of new technology services which may ultimately prove beneficial to the American public. Nonetheless, API pointed out that the Commission's proposal would ultimately force the migration of thousands of point-to-point microwave systems in the Private Operational-Fixed Microwave Service (POFS) now authorized for operation in the bands 1850-1990 MHz, 2130-2150 MHz, and 2180-2200 MHz. Accordingly, API remains greatly concerned over the reallocation of 2 GHz spectrum and the Commission's proposals to eventually displace incumbent licensees from spectrum assignments in the target bands.

2. API again urges the Commission to take steps to ensure that the transition from POFS to new technology operations will not be disruptive to incumbent operations since such disruption would have a harmful impact on the public safety. Accordingly, API believes that the less drastic migration proposal outlined in the Commission's current proceeding is a step in the right direction. Provided that the proposal is implemented in a reasonable fashion, API agrees with several other commenters that the immediate threat to the public health and safety triggered by this proceeding could be significantly minimized. Nonetheless, API is concerned that certain commenters urged the Commission to take administrative shortcuts in this

proceeding which would negate the benefits which could be realized under the Commission's modified transition proposal. API's position that the transition to new technologies must take place in a way that will preclude disruption of critical incumbent operations is shared by many other participants. API urges the Commission to move cautiously in this proceeding and to carefully consider the recommendations of incumbent licensees prior to adopting any final rules to govern the proposed transition.

## II. REPLY COMMENTS

3. API reiterates its endorsement of the Commission's goal to foster the development and deployment of new technologies. Indeed, certain of the new technologies which have been proposed for eventual operation in the reallocated spectrum could ultimately prove of benefit to the oil and gas industries. Nevertheless, the Commission bears an undeniable obligation to render its administrative decisions in a manner consistent with the "public interest". Since the current use of the target spectrum revolves in significant part around the safe and efficient operation of basic industrial, energy utility and transportation functions vital to the public welfare, the Commission must take every possible step to diminish the migration burden

faced by incumbent licensees. Many of these licensees operate under strict regulations which mandate the reliable communications and remote control capabilities offered by 2 GHz spectrum. Accordingly, API seeks assurance that a sufficient transition period will be adopted to allow for the complex long range planning which will be triggered by any displacement of incumbent licensees.

**A. The Commission Must Adopt a Transition Period Which Will Ensure Adequate Planning and Preparation for Non-Disruptive Migration of Incumbent Licensees**

4. API agrees with other commenters that the Commission may have created confusion by calling the voluntary negotiation period a "transition period."<sup>2/</sup> API agrees with UTC that the proposed "general transition framework" must remain in effect so long as there are microwave systems operating in the 2 GHz band, and further agrees that the only timing issue which remains to be resolved is the actual length of the period during which only "voluntary" negotiations would be permitted.<sup>3/</sup> Accordingly, it may be misleading to label the purely

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<sup>2/</sup> See e.g. Comments of Utilities Telecommunications Council (UTC) at 15.

<sup>3/</sup> Id.

"voluntary" negotiation period a "transition period" since negotiations may continue and migration from the band, whether voluntarily or involuntarily, may proceed long after the purely "voluntary" negotiation period ends.

5. API remains convinced that the voluntary negotiation period should be sufficiently long to allow relatively trouble-free relocation of incumbent licensees from current spectrum assignments. Many parties agreed that actual migration to new frequencies or technologies will be a complex and potentially time-consuming matter.<sup>4/</sup> Indeed, even those parties with an interest in deployment of PCS and other new spectrum technologies admit that a significant period of time will be needed to ensure a trouble-free handoff.<sup>5/</sup> API members surveyed are substantially in accord with the estimates of other current POFS licensees that a reasonable estimate of time required to complete a single microwave facility relocation is 15 months and that relocation of multiple path facilities would require significantly longer time frames.<sup>6/</sup> Further, these estimates tend to be somewhat conservative since they

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<sup>4/</sup> See e.g. Comments of UTC at 18, Association of American Railroads (AAR) at 14-15.

<sup>5/</sup> See generally e.g. Comments of Associated PCN Company.

<sup>6/</sup> AAR Comments at 14; UTC Comments at 20.

generally assume a straightforward modification without the necessity for any major changes in antenna structures, acquisition and development of new transmitter sites, and the concomitant zoning, environmental and FAA approvals which could significantly extend the average relocation timetable. Indeed, some parties assert that for the sophisticated systems operated by several many industrial licensees, it could take more than a decade to complete system migrations.<sup>7/</sup>

6. Based on its review of the Comments submitted in this proceeding, API reasserts that a five year "purely voluntary" transition period is the minimum which would provide adequate time for an orderly transition. Five years will allow for planning and other migration activities, and will allow relatively expeditious deployment of new technologies. Moreover, "hold outs" by incumbent licensees beyond this time frame will be rare because incumbents realize that when a band is reallocated to a new service, licensees remaining in the band may soon be unable to obtain replacement equipment and spare parts from equipment manufacturers since maintaining such production lines quickly becomes unprofitable. Accordingly, API agrees with

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<sup>7/</sup> UTC Comments at 21.

other commenters that practical realities will give current licensees the impetus to engage in timely and earnest negotiation for migration from present spectrum assignments.<sup>8/</sup>

7. Additionally, API is concerned that the Agency may also create unnecessary dislocations by adoption of a premature "trigger date" for the beginning of the voluntary negotiation period. API has urged the Commission to defer commencement of the transition period until the agency begins granting authorizations to construct new technology systems.<sup>9/</sup> Upon review of Comment filed by other parties, API is persuaded that, while uniform commencement of the transition period upon the date of Commission grant of new technology authorizations is feasible and would perhaps be administratively convenient, a "staggered transition start date" system operating on a market-by-market basis is also a workable and equitable formula for starting the transition clock.<sup>10/</sup> Such an approach would accommodate the wide divergence of operation commencement dates which new technology licensees will propose, and will provide

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<sup>8/</sup> UTC Comments at 10, Comments of Harris Equipment-Farinon Division in ET Docket No. 92-9 at 1 (June 8, 1992).

<sup>9/</sup> API Comments at 9.

<sup>10/</sup> UTC Comments at 17, AAR at 17.

incumbent licensees in every market (including those where commencement of new technology operation will occur more slowly) with adequate notice and time to conduct an orderly migration. This is an important consideration for incumbent licensees operating in markets where new technologies are not deployed until the end of a "five year national transition period" since they would not face the risk of totally unexpected demands for practically instant involuntary relocation.

8. API is alarmed to note that certain parties with an interest in deployment of new technologies portray incumbent licensees as possibly interested in delaying the transition to "hold hostage" new technology proponents and demand unreasonable migration costs.<sup>11/</sup> Such commenters used this totally unrealistic scenario to urge the Commission to eliminate any transition period and to allow involuntary relocation proceedings to commence immediately since new technology licensees would be required to provide comparable facilities to displaced POFS licensees.<sup>12/</sup> Apparently, such commenters believe that incumbent licensees are in the "spectrum selling" business. Nothing could be

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<sup>11/</sup> Comments of Telocator at 7; American Personal Communications at 5-6.

<sup>12/</sup> Comments of Telocator at 7; Cox Enterprises at 6.

further from the truth. As API and other participants have pointed out, industrial users are not in the business of speculating with spectrum, but use microwave facilities to provide highly reliable telecommunications capabilities necessary to ensure that the basic necessities of modern life such as energy, commodities and transportation may be safely provided.<sup>13/</sup> Telecommunications reliability, not profit, is the motive that drives private system users to build and maintain extensive microwave systems.

Accordingly, it would be completely contrary to the primary business intent of such users to run the risk of potentially catastrophic telecommunications failure for what would, in effect, be a relatively minor short-term financial gain. Clearly, with such vital telecommunications functions at stake, it is in the interest of incumbents to negotiate openly and expeditiously with new technology licensees to protect critical communications capabilities, and arguments to the contrary should be given absolutely no weight. The voluntary transition period suggested by API is essential to ensure that the complicated process of system reconfiguration to new frequencies or technologies may be done in an orderly and safe manner.

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<sup>13/</sup> See API Comments at 14, UTC at 8-9.

**B. The Commission Must Ensure that Replacement Spectrum and/or Technologies are Comparable and that Adequate Migration Compensation is Available to Displaced Licensees**

9. API is pleased to note general accord by participants that any replacement spectrum and/or facilities must provide displaced incumbents with telecommunications capabilities comparable to those from which they are displaced. API generally agrees with those parties who state that comparability is an issue best left to private negotiation between incumbent and new technology licensees.<sup>14/</sup> API also concurs that most issues of comparability and reliability may be successfully negotiated among parties privately without the necessity for commitment of Commission resources and the costs to the public which such a commitment would entail.

10. API joins other commenters who have asserted that the Commission must ensure that any replacement spectrum and/or facilities will provide telecommunications capabilities which are equal or superior to incumbent's existing facilities. This comparability must exist in all aspects of system performance, taking into account

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<sup>14/</sup> Comments of Personal Communications Network Services of New York (LOCATE) at 2; NYNEX Comments at 4; AAR Comments at 12-14.

reliability factors, carriage capacity, data speed and throughput, bandwidth, and the total efficiency of replacement facilities.<sup>15/</sup>

11. Additionally, the Commission must ensure that migration-cost compensation to displaced incumbent licensees is adequate. All costs related to migration from spectrum assignments by incumbents must be borne by the new technology licensee.<sup>16/</sup> All costs must be calculated to ensure equitable treatment of incumbent licensees.

12. The Commission must also ensure that its rules authorize incumbent microwave licensees, at their option, to actually construct and test replacement facilities even though the new technology providers must pay the costs associated with such construction and testing. Clearly, it will be more efficient for displaced licensees to design and build their own replacement systems. The Commission's must clarify that, absent an agreement to the contrary, it is presumed that planning, building and testing of replacement

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<sup>15/</sup> AAR Comments at 19-20; National Rural Electric Cooperative Association Comments at 7.

<sup>16/</sup> API Comments at 14-16.

facilities will be under the direct control of the displaced incumbent licensee.<sup>17/</sup>

13. Additionally, the Commission must ensure that even in those situations where a new technology licensee constructs and tests replacement facilities, all replacement facilities will be privately owned by the displaced incumbent licensee. This is essential, since the critical operations now conducted on 2 GHz microwave frequencies by incumbent licensees cannot be conducted with the same reliability level on telecommunication facilities operated by common carriers or other third parties. Such service providers have competing service demands and, in emergencies for example, cannot ensure that they will be able to meet the unique and critical operational requirements of incumbent licensees.<sup>18/</sup>

**C. Arbitration and/or Mediation Will Provide the Best Means of Dispute Resolution**

14. API and others note that the Commission intends to rely whenever possible on marketplace forces to bring about

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<sup>17/</sup> AAR Comments at 19-20; NYNEX Comments at 7-8.

<sup>18/</sup> AAR Comments at 20.

the introduction of new telecommunication services.<sup>19/</sup> This approach certainly is of great value in a proceeding which constitutes an attempt to introduce new services which in many cases remain undefined. Further, the actual needs of incumbent licensees displaced from 2 GHz assignments will vary widely. Accordingly, the FCC should allow broad negotiation latitude and ample time to incumbents and new technology licensees in order to foster private resolution of migration challenges. Further, the Commission should allow mediation and/or arbitration to be employed in cases of disputes between parties. In fact, API and others believe that the Commission should mandate mediation and/or arbitration as a prerequisite for Commission involvement as a final dispute arbiter.<sup>20/</sup>

15. Should the Commission allow an ample time frame for earnest negotiations and mediation and/or arbitration of disputes, several advantages will be realized. Specifically, such a policy will likely allow disputes to be handled more promptly than through Commission procedures, and the drain on Commission resources for dispute resolution

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<sup>19/</sup> UTC Comments at 4.

<sup>20/</sup> UTC Comments at 7-11; AAR Comments at 21; Time Warner Comments at 17; LOCATE Comments at 13.

would be substantially minimized, thus serving the public interest by a cost-saving to the Agency. The evidence available at this time confirms that microwave licensees will negotiate in good faith for relocation to alternate frequencies or facilities where reasonable offers are made.<sup>21/</sup>

**D. Spectrum from the Federal Government 2 GHz Band Must be Made Available to All Displaced Incumbents on an Equal Eligibility Basis**

16. API is please to note agreement by many commenters that unused government spectrum in the band 1710-1850 MHz should be made available to displaced incumbent licensees who, for technological reasons, are unable to satisfactorily migrate away from the 2 GHz spectrum range.<sup>22/</sup> API reiterates that the Commission must take all possible steps to negotiate an interagency agreement with the National Telecommunications and Information Administration (NTIA) to ensure that procedures are quickly put into place to allow access to frequency assignments in the government 2 GHz band for displaced POFS licensees.

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<sup>21/</sup> UTC Comments at 8-10; LOCATE Comments at 8-12.

<sup>22/</sup> See e.g., Comments of United Sates Telephone Association at 3; Telocator at 14; NYNEX at 2.

17. Nonetheless, API is troubled by the assertion that a priority for replacement spectrum in the federal government band should be given to "public safety and/or public service" licensees. While API understands that the needs of these entities must be given a high priority, the rationale underlying special treatment for such licensees is predominantly economic, and not related strictly to any heightened critical communication needs. Certainly, it is in the public interest to allow public and quasi-public entities to have a smooth migration and to have no costs involved that would have to be passed along to the public in the form of higher taxes. Nonetheless, the services provided by petroleum and natural gas companies over 2 GHz private microwave systems are essential to ensure that America's energy needs are met in a manner which also ensures the maximum degree of safety to the public. Accordingly, API asserts that no preference should be given to any displaced licensee with regard to replacement spectrum from the federal 2 GHz band, since practically all operations conducted in the band at this time are of critical value to the public health and/or safety.

### III. CONCLUSION

18. In general, API agrees that the Commission's proposed transition framework may prove workable, provided that adequate time for migration is coupled with a sufficient reliance on private negotiations and marketplace mechanisms to provide displaced incumbent 2 GHz licensees a seamless handoff of telecommunications services with a minimum of harmful economic consequences. API believes that, should the Commission provide an appropriate transition period, minimum comparability standards, adequate compensation for migration costs, and maintenance of absolute system control by displaced licensees, the proposed transition could proceed with minimal harmful impact on the public.

**WHEREFORE, THE PREMISES CONSIDERED,** the American Petroleum Institute respectfully urges the Federal Communications Commission to act in accordance with the views expressed herein.

Respectfully submitted,

**The American Petroleum Institute**

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**CERTIFICATE OF SERVICE**

I, Jacqueline Jenkins, a secretary in the law firm of Keller and Heckman, hereby certify that a copy of the foregoing Reply Comments of the American Petroleum Institute has been served this 12th day of February, 1993 via hand delivery to the following:

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