



## **TELECOM REGULATORY AUTHORITY OF INDIA**

### **Recommendations**

**on**

### **Issues related to FM Radio Broadcasting**

**5<sup>th</sup> September 2023**

**Mahanagar Doorsanchar Bhawan**

**Jawahar Lal Nehru Marg**

**New Delhi-110002**

Website: [www.trai.gov.in](http://www.trai.gov.in)

## Contents

<b>Chapter</b>	<b>Title</b>	<b>Page No.</b>
	List of Acronyms	1
<b>I</b>	Introduction	3
<b>II</b>	Issues related to FM Radio Broadcasting	7
<b>III</b>	Summary of Recommendations	37
<b>Annexure</b>		
<b>I</b>	Reserve Prices for e-Auction of 2nd batch of Private FM Radio Phase-III Channels	39
<b>II</b>	MIB reference dated 11 <sup>th</sup> May 2022	41
<b>III</b>	MIB letter dated 27 <sup>th</sup> January 2011	43
<b>IV</b>	TRAI letter dated 9 <sup>th</sup> February 2011	45
<b>V</b>	Annual License Fee paid/due in Phase III by FM Radio operators in top 15 cities in terms of total revenue of the city in 2021-22	47

## List of Acronyms

<b>Abbreviation</b>	<b>Description</b>
AIR	All India Radio
ALF	Annual License Fee
ANI	Asian News International
AROI	Association of Radio Operators for India
BECIL	Broadcast Engineering Consultants India Limited
CP	Consultation Paper
DoT	Department of Telecommunication
EMC	Electromagnetic Compatibility
ESD	Electrostatic Discharge
FM	Frequency Modulation
FY	Financial Year
GoI	Government of India
GoM	Group of Ministers
GR	Gross Revenue
GSM	Global System for Mobile Communication
GST	Goods and Services Tax
ICEA	India Cellular and Electronics Association
ITU	International Telecommunication Union
J&K	Jammu & Kashmir
MAIT	Manufacturers' Association of Information Technology
MeitY	Ministry of Electronics and Information Technology
MIB	Ministry of Information and Broadcasting
NavIC	NAVigation with Indian Constellation
NBSA	News Broadcasting Standards Authority (India)
NE	North East
NOTEF	Non-refundable One Time Entry Fee
OEM	Original Equipment Manufacturer
OTEF	One Time Entry Fee
OTT	Over The Top
PTI	Press Trust of India
RF	Radio Frequency

RJ	Radio Jockey
ROTEF	Reserve One Time Entry Fee
RP	Reserve Prices
TRAI	Telecom Regulatory Authority of India
Wi-Fi	Wireless Fidelity

# **Chapter I**

## **Introduction**

- 1.1. Radio, due to its extensive coverage, ease of portability, low setup costs, and affordability, is widely regarded as one of the most popular and cost-effective mass communication mediums. The versatility of FM Radio broadcasting makes it a favored medium for providing entertainment, information, and education.
- 1.2. To improve the variety and quality of radio broadcasting, the Government of India introduced a policy during the Ninth Five Year Plan (1997-2002) that allowed private sector to establish FM radio stations in India.
- 1.3. The first phase of FM radio broadcasting (Phase-I) was initiated by the Ministry of Information and Broadcasting (MIB) in 1999. During this phase, private agencies were offered a total of 108 channels in 40 cities within the FM spectrum band (88 – 108 MHz). An auction mechanism involving multiple rounds was employed to grant these permissions, and the operational licenses were awarded for a duration of 10 years. Out of the 108 channels on offer, bid amount was received for only 37 channels. However, only 21 channels became operational.
- 1.4. On 13<sup>th</sup> July 2005, the Government announced the policy for Phase-II<sup>1</sup> of FM Radio Broadcasting. For this phase, the government introduced a two-stage bidding process, that is bidders were checked for eligibility and then allowed financial bidding. This resulted in the offering of 337 channels across 91 cities<sup>1</sup>. In the said Phase II 284 bids were submitted, and after scrutiny, permission was granted for 245 channels spanning 87 cities. However, only

---

<sup>1</sup> The phase II cities comprised of cities with a population of 3 Lakh or more

222 channels became operational in Phase II. Additionally, all 21 operational channels from Phase-I migrated to Phase-II by paying a migration fee. Therefore, a total of 243 FM Radio channels became operational across 86 cities after Phase-II.

- 1.5. To expand the reach of FM Radio broadcasting across the country, the Government initiated Phase III with the aim of establishing private FM Radio channels in all cities with a population exceeding 1 lakh. Furthermore, 11 additional cities with a population less than 1 lakh in the border areas of Jammu & Kashmir (J&K) and the North East (NE) region were proposed to be included in this expansion. The Government issued Policy Guidelines for Phase-III of FM Radio Broadcasting on 25<sup>th</sup> July 2011.
- 1.6. MIB sent a reference dated 9<sup>th</sup> April 2013 to TRAI seeking recommendations on the amount of migration fee to be paid by existing operators on their migration from Phase-II to Phase III. TRAI sent its recommendations to MIB on 20<sup>th</sup> February 2014. MIB accepted TRAI's recommendations and subsequently 231 operational channels from Phase-II migrated to Phase-III after paying the migration fee.
- 1.7. On 16<sup>th</sup> December 2014, MIB sought TRAI's recommendations on Reserve Prices (RP) for FM Radio channels in 264 new cities. The Authority, after due consultations, sent its recommendations on 'Reserve Price for auction of FM Radio channels in New Cities' on 24<sup>th</sup> March 2015.
- 1.8. The e-auction of the first batch of Private FM Radio Phase-III channels commenced on 27<sup>th</sup> July 2015. This auction included 135 vacant channels in 69 existing cities where private FM Radio channels were already operational. The reserve prices for these cities were set as the highest bid price received during Phase-II for each respective city. Out of the 135 private FM Radio channels on offer, 96 were successfully auctioned in 55 cities.

- 1.9. The e-auction of the second batch of Private FM Radio Phase-III channels began on 20<sup>th</sup> June 2016. In this batch 266 channels in 92 cities, including 227 channels in 69 new cities and 39 channels in 23 existing cities were put up for auction. The reserve prices fixed by MIB for the 69 new cities, except for the cities in North-east and border areas, differed from the reserve prices recommended by TRAI in its recommendations dated 24<sup>th</sup> March 2015 **(Annexure-I)**. In the second batch, only 66 channels in 48 cities were successfully auctioned.
- 1.10. On 22<sup>nd</sup> August 2019, MIB sought TRAI's recommendations on fresh reserve prices for 283 cities (260 new + 23 existing) under the FM Phase-III Policy considering various factors such as inflation and indexation of reserve prices calculated between 2011 and 2015. In response, the Authority sent its recommendations on 'Reserve Price for auction of FM Radio channels' on 10<sup>th</sup> April 2020. MIB sent a back reference<sup>2</sup> to TRAI on 13<sup>th</sup> January 2022 for reconsidering these recommendations. TRAI sent its response<sup>3</sup> to back reference to MIB on 1<sup>st</sup> August 2022. The recommendations are pending with MIB.
- 1.11. As on 30<sup>th</sup> June 2023, there are 388 operational private FM Radio channels in India.
- 1.12. MIB vide its letter dated 11<sup>th</sup> May 2022 **(Annexure-II)**, sought recommendations of TRAI on the following two issues:
- a. Remove the linkage to Non-Refundable One Time Entry Fee (NOTEF) in the formula for annual fee as prescribed in the FM Ph-III Policy Guidelines dated 25.07.2011.

---

<sup>2</sup> [https://www.trai.gov.in/sites/default/files/TRAI\\_Response\\_01082022.pdf](https://www.trai.gov.in/sites/default/files/TRAI_Response_01082022.pdf)

<sup>3</sup> [https://www.trai.gov.in/sites/default/files/Letter\\_to\\_Secy\\_01082022.pdf](https://www.trai.gov.in/sites/default/files/Letter_to_Secy_01082022.pdf)

- b. Extend the existing FM license period of 15 years by 3 years.
- 1.13. In order to discuss various issues related to FM Radio broadcasting, the Authority held a meeting with representatives of Association of Radio Operators for India (AROI) on 5th August 2022. Representatives of AROI, inter-alia, raised the following issues for consideration of the Authority:
- i. Permitting private FM Radio channels to broadcast independent news bulletins.
  - ii. Availability of FM Radio Receivers in Mobile Handsets.
- 1.14. To deliberate on the issues referred to by MIB and points raised by AROI, the Authority issued a Consultation Paper (CP) on 'Issues related to FM Radio Broadcasting' on 9<sup>th</sup> February 2023. Written comments and counter-comments on the CP were invited from stakeholders by 9<sup>th</sup> March 2023 and 23<sup>rd</sup> March 2023 respectively. All comments received have been posted on the TRAI's website. Subsequently, an Open House Discussion was held through video conferencing mode on 26<sup>th</sup> April 2023.
- 1.15. After carefully examining and analyzing various issues emanating from the written submissions of the stakeholders, the Open House Discussion and international practices, the Authority has finalized its recommendations. Chapter II discusses various issues related to FM Radio Broadcasting. A summary of the recommendations is provided in Chapter III.



## **Chapter II**

### **Issues related to FM Radio Broadcasting**

#### **A. Annual License Fee (ALF)**

2.1 As per the provisions for Annual License Fee (ALF) provided in the FM Phase-III Policy Guidelines dated 25<sup>th</sup> July 2011, permission holders are required to pay ALF to the Government @ 4% of Gross Revenue of its FM radio channel for the financial year or @ 2.5% of Non-refundable One Time Entry Fee (NOTEF) for the concerned city, whichever is higher. In the CP, the stakeholders were asked whether the extant provisions related to the ALF are reasonable. In case the provisions are not deemed reasonable, the stakeholders were requested to provide a methodology and criteria for determining the ALF for private FM Radio channels.

#### **Stakeholders' Comments**

2.2 Most of the stakeholders are of the opinion that the existing provisions for the ALF mentioned in the FM Phase-III Policy Guidelines need revision. They mentioned that the current formula for calculating ALF based on the NOTEF, is not in line with TRAI's recommendations on Phase III dated 22<sup>nd</sup> February 2008, where it recommended calculation of annual license fee based on Reserve One Time Entry Fee (ROTEF). They contend that calculating the fee based on NOTEF results in discrimination and adverse economic consequences, as the bid amounts have increased substantially. The stakeholders have further mentioned that the high bid amounts are affecting all permission holders even those who had not taken part in the auction of Phase III.

2.3 Some stakeholders have mentioned that fixing the fee based on NOTEF violates Section 11(1) of the TRAI Act, as the MIB did not consult TRAI in the

matter and failed to provide any rationale for the current formula till date. They cited the example of New Delhi, where the bidding price for a single frequency in Phase III was significantly high, resulting in a high NOTEF of Rs. 169 crore. According to these stakeholders this has negatively impacted even those Radio broadcasters who did not participate in the bidding process. They further mentioned that in contrast, cities where frequencies were not auctioned in Phase III, such as Kolkata, have a more reasonable ALF as a percentage of gross revenue as compared to the cities where frequencies were auctioned.

- 2.4 Some stakeholders are of the view that the current economic scenario, worsened by the pandemic, requires a fee structure that considers the financial realities of FM broadcasters. Stakeholders have also stated that there is a significant drop of about 50% in revenue during the pandemic, with projections suggesting only a partial recovery of 70% by 2023. According to these stakeholders, 2.5% of NOTEF as license fee had exceeded 100% of the revenue earned during the early months of 2020-21 for many stations which is unreasonable and detrimental to the survival of the FM industry.
- 2.5 Some stakeholders have mentioned that the excessive ALF has already led to broadcasters surrendering frequencies and may lead to further shutdowns of channels in the coming years. They have further mentioned that the sudden increase in ALF expenses, up by 438%, has forced broadcasters to completely change their business strategies, particularly regarding programming. Stakeholders have also stated that the FM radio industry had lost a substantial amount up to INR 150-200 crores for the financial years 2020 and 2021 due to the calculation of annual fees based on NOTEF.
- 2.6 The stakeholders assert that the current method of calculating ALF based on NOTEF prices is discriminatory and creating gaps, particularly against smaller

private FM radio operators who cannot compete with higher bidders and pay the fees associated with such NOTEF. They argue that auction-determined prices do not always reflect the fair value of the resource/frequency as they are determined under a supply constraint and that using such bid prices may not be reasonable.

### **Analysis**

- 2.7 On 12<sup>th</sup> February 2004, MIB sent the report of the Radio Broadcast Policy Committee, headed by Dr. Amit Mitra, to TRAI to make appropriate recommendations on the 2<sup>nd</sup> Phase of private FM Radio broadcasting.
- 2.8 In response TRAI sent its recommendations on Licensing Issues Relating to 2<sup>nd</sup> Phase of private FM Radio Broadcasting to MIB on 11<sup>th</sup> August 2004. In its recommendations TRAI agreed with the recommendations of the Committee that the annual fees should be fixed as a percentage of the annual revenues and that this percentage should be 4%.
- 2.9 Following provisions were prescribed by MIB in Policy guideline for Phase II of private FM Radio:

#### **“5. Fee and duration:**

*5.1 Annual Fee shall be charged @ 4% of gross revenue, for the year or @ 10% of the Reserve OTEF limit for the concerned city, whichever is higher. Gross Revenue for this purpose would be the gross revenue without deduction of taxes. ....”*

- 2.10 MIB, vide its letter dated 13.11.2007, sought the recommendations of TRAI on the issue of modifications to be incorporated in policy for FM Radio broadcast Phase III.

2.11 TRAI sent its Recommendations on 3rd Phase of Private FM Radio Broadcasting to MIB on 22<sup>nd</sup> February 2008, wherein following recommendations were made on the issue of annual license fee:

*“1.9.6 Annual fee structure*

*The Authority recommends:*

- *The method of calculation of reserve one time entry fee (OTEF) and annual fee may be same as prescribed for FM Radio broadcasting Phase-II.*

*1.9.7 Relaxation of fee structure for North-East and J&K*

*The Authority recommends:*

- *The rate of Annual fee may be reduced to 50% of what is being charged from all existing permission holders in other areas for private FM Radio broadcasters in North East (NE) and Jammu & Kashmir (J&K) region for an initial period of three years from the date of issue of Letter of Intent (LoI) to give such operators time to setup their network and start operations. This will ensure more FM Radio broadcasters, better program and viable business model for private FM Radio broadcasters in these regions.”*

2.12 MIB, vide its letter dated 27<sup>th</sup> January 2011 forwarded recommendations of Group of Ministers (GoM) constituted for deciding the methodology for FM Phase-III seeking recommendations of TRAI on the same **(Annexure-III)**. The gist of recommendations of GoM is as under:

*“(i) The GoM recommended that the ascending e-auction methodology as followed in 3G auctions may be adopted for award of license in FM Radio Phase-III.*

*(ii) For Phase-III, the reserve price of new channels in existing FM Phase-II cities may be fixed at the highest bid received for that city in Phase-II. In cities which were being taken up afresh, the reserve price could be pegged at the highest bid received during FM Phase-II for that category of cities in that region. In case the benchmark from Phase-II for a particular region was not available, then the lowest of the highest bid received in other regions for that category of cities may be taken as the reserve price. In case of non-*

*availability of any benchmark on the basis of the above for a particular city, the Ministry of I&B could take a suitable decision.*

- (iii) With regard to the determination of annual license fee for Phase-III, the GoM recommended that the same formula used for calculation of annual license fee for FM Phase-II should be followed in FM Phase-III as well i.e., @4% of Gross Revenue (GR) or 10 % of Reserve One Time Entry Fee (25% of the highest bid) for the city, whichever is higher. For e-auction, this will translate to 4% of GR or 2.5% of the Bid price, whichever is higher, since every permission holder will be paying the same bid price.*
- (iv) The period of permission in FM Phase-III could be 15 years. The Ministry of Information and Broadcasting would formulate a separate policy for the license period from the present 10 yrs to 15 yrs for FM (Phase-II) operators.”*

2.13 TRAI, vide its letter dated 9<sup>th</sup> February 2011, accepted the proposal of MIB. **(Annexure-IV).**

2.14 Subsequently, MIB notified the Policy Guidelines for Phase-III of FM Radio Broadcasting on 25<sup>th</sup> July 2011, wherein the following provisions regarding Annual License Fee have been prescribed:

**“6. Annual Fee:**

*6.1 (a) Subject to the provisions contained in sub-para (b), the Permission Holder shall be liable to pay an Annual Fee to the Government of India every year charged @ 4% of Gross Revenue of its FM radio channel for the financial year or @ 2.5% of NOTEF for the concerned city, whichever is higher.*

*(b) The permission holders in the States of North East (i.e. Arunachal Pradesh, Assam, Meghalaya, Manipur, Mizoram, Nagaland, Sikkim and Tripura,) and Jammu & Kashmir (J&K) and island territories (i.e, Andaman and Nicobar Islands and Lakshadweep) will be required to pay an Annual Fee to the Government of India charged @ 2% of Gross Revenue for each year or 1.25% of NOTEF for the concerned city, whichever is higher, for an initial period of three years from the date from which the annual license fee becomes payable and the permission period of 15 years begins. The revised fee structure will also be applicable to existing operators in these States/UTs to enable them to effectively compete with the new operators. The three year*

*period for the existing operators shall be reckoned from the first day of the commencement of the next quarter (refer para 6.3) subsequent to the date of issuance of these guidelines.*

*6.2 Gross Revenue for this purpose would be the gross inflow of cash, receivables or other consideration arising in the course of ordinary activities of the FM Radio Broadcasting enterprise from rendering of services and from the use by others of the enterprise resources yielding rent, interest, dividend, royalties, commissions etc. Gross Revenue shall, therefore, be calculated, without deduction of taxes and agency commission, on the basis of billing rates, net of discounts to advertisers. Barter advertising contracts shall also be included in the gross revenues on the basis of relevant billing rates. In the case of a permission holder providing or receiving goods and services from other companies that are owned or controlled by the owners of the permission holder, all such transactions shall be valued at normal commercial rates and included in the profit and loss account of the permission holder to calculate its gross revenue.*

*.....”*

- 2.15 As per the policy guidelines, permission holders are required to pay an Annual License Fee to the Government @ 4% of Gross Revenue of its FM radio channel for the financial year or @ 2.5% of NOTEF for the concerned city, whichever is higher.
- 2.16 As indicated earlier, 243 private FM Radio channels became operational in 86 cities in Phase-II. In some cities most of the channels became operational in Phase II e.g., Delhi, Mumbai, Bengaluru, Pune, Ahmedabad. Operators in these cities were paying annual license fee higher of the 4% of GR or 2.5% of highest bid in that city. The remaining 1 or 2 channels in these cities were auctioned in Batch 1 of Phase III.
- 2.17 It is noted that when Phase III auctions were announced, in certain cities, where some private Radio channels were operational, there were only one or two channels available for operators. In such cities, the auction in Phase III (Batch 1) resulted in very high bid prices. These high bid prices became the new NOTEF for these cities. All the operators, including the pre-existing FM

Radio operators, who did not participate in the said auction, were then required to pay an annual license fee as per the new NOTEF. Details of annual license fee paid by the FM Radio broadcasters from FY 2017-18 to FY 2021-22 in top 15 cities in terms of total revenue of a city during 2021-22 are presented at **Annexure-V**. The Authority is of the view that such stipulation goes against the business certainty aspect for any business. In such a scenario, some new operator can play spoilsport with the viability of all existing stakeholders. The pre-existing FM Radio operators have been subjected to such a scenario in quite-a-few cities due to the clause linking the license fee payable to 2.5 % the NOTEF discovered in later spectrum auctions. Table 1 below provides number of FM Radio channels in different ranges of Annual License Fees due as % of GR for the year 2021-22.

**Table 1: Ranges of Annual License Fees due as % of GR for the year 2021-22**

<b>Range of Annual License Fee due as % of GR for the year 2021-22</b>	<b>No. of FM Radio channels</b>
0 - 4	200
4 - 10	100
10 - 20	48
20 - 30	13
30 - 40	7
40 - 60	10
60 - 100	2
100 - 200	0
200 - 400	2

(data of 382 FM Radio channels)

2.18 Upon analysing the available data on the ALF paid by FM operators, the Authority observed that the ALF calculated based on the NOTEF were disproportionately high. One can observe from the Table-1 above that more than 47% Radio Channels are subjected to payment of license fee that is more than 4%. Almost 10% Radio stations (34 out of 382) are having license fee

dues that are more than 30% of their revenue. The data clearly reflects the anomaly of linking the license fee with 2.5% of NOTEF.

- 2.19 The situation of higher ALF has been exacerbated during the pandemic, where the license fees even surpassed the annual gross revenue for two radio channels. In one instance, it is as high as 332% of the annual revenue earned by the operator. The discrepancy emphasizes the intrinsic discriminatory nature of the existing formula and brings to light the unfavorable economic ramifications experienced by the license holders.
- 2.20 NOTEF is nothing but spectrum charge. The Authority recognizes that the existing formula for determining the annual license fee, with its reliance on NOTEF, impinges on the business model for FM operators. The current license fee model alters the license fee for already existing FM radio operators in a city, whenever new auctions are held for that city. By tying the license fee to NOTEF, operators who did not participate in bidding processes face an unfair burden. This not only undermines fairness but also hinders the growth and sustainability of the FM industry as a whole.
- 2.21 Furthermore, the pandemic has further impacted the radio business and there is a need for a revised approach to the annual license fee. The license fee for quite a few FM Radio operators has exceeded the operators' annual gross revenue, it becomes evident that the current formula is impractical and detrimental, particularly in times of economic crisis. Such a formula fails to consider the financial realities faced by FM operators and brings in business uncertainty.
- 2.22 The business issues arising out of ALF based on NOTEF have been amply highlighted by the stakeholders in their submissions. The Authority in-principle accepts that a revised approach is necessary for the license fee on FM Radio operators. The revised methodology should ensure a fairer and more reasonable fee structure, where the license fee is directly proportionate to the



operator's actual revenues. This adjustment would rectify the discriminatory and detrimental nature of the current formula, ensuring fairness, sustainability, and an enabling policy/ licensing framework for the FM Radio industry.

2.23 In FM Phase III policy guidelines Gross Revenue is defined as follows:

*“6.2 Gross Revenue for this purpose would be the gross inflow of cash, receivables or other consideration arising in the course of ordinary activities of the FM Radio Broadcasting enterprise from rendering of services and from the use by others of the enterprise resources yielding rent, interest, dividend, royalties, commissions etc. Gross Revenue shall, therefore, be calculated, without deduction of taxes and agency commission, on the basis of billing rates, net of discounts to advertisers. Barter advertising contracts shall also be included in the gross revenues on the basis of relevant billing rates. In the case of a permission holder providing or receiving goods and services from other companies that are owned or controlled by the owners of the permission holder, all such transactions shall be valued at normal commercial rates and included in the profit and loss account of the permission holder to calculate its gross revenue.”*

2.24 According to the viewpoint held by the Authority, incorporating taxes or GST in the Gross Revenue (GR) calculation is deemed unjust since it results in the license fee being assessed on an amount that does not truly represent the FM stations' actual revenue. Consequently, this leads to FM Radio stations effectively paying license fees on their tax receipts also that are collected on behalf of the government and accordingly paid to the government.

2.25 In light of the above and to adopt a fairer approach for determining the license fee, the Authority is of the view that GR should not include GST collected on behalf of the Government and actually paid to the Government. ALF for a FM radio channel should be calculated as 4 % of the GR excluding GST.

2.26 **The Authority recommends that the annual license fee of a FM radio channel should be de-linked from Non-Refundable One Time Entry Fee (NOTEF). The license fee should be calculated as 4% of the Gross Revenue (GR) of the FM radio channel during the respective financial year. GST should be excluded from Gross Revenue (GR).**

**B. Extension of the existing FM Radio permission period of 15 years by 3 years**

2.27 The FM Radio Policy Guidelines for Phase-III stipulate a permission period of 15 years for FM Radio broadcasters. However, these guidelines do not include any provisions for extension of permission granted to FM radio broadcasters. During the pandemic, the business operations of FM radio broadcasters have been constrained. In light of this situation, MIB, at the request of AROI, sought recommendations from TRAI regarding a potential extension of the existing permission period by 3 years. Stakeholders were consulted to determine whether an extension is warranted and, if so, to propose a revised permission period along with detailed reasoning. Alternatively, if an extension is not deemed necessary, stakeholders were invited to suggest alternative measures to support private FM Radio broadcasters in overcoming the pandemic's impact, providing quantified parameters and justification for their recommendations.

2.28 Several stakeholders were in favour of an extension of the existing permission period by 3 years. Stakeholders have mentioned that during pandemic, industries such as real estate, retail, hospitality & restaurants, education, media & entertainment, which traditionally have been the core advertisers on FM radio, reduced their advertisement expenditure. According to them this reduction in advertising spending, coupled with the inability to procure enough media advertisement revenue from the private sector during the pandemic, resulted in heavy financial losses for FM Radio broadcasters. These stakeholders further mentioned that the cancellation of on-ground events,

which serve as a secondary source of income for FM radio broadcasters, further contributed to their revenue losses. The stakeholders stated that despite these challenges, private FM radio broadcasters had to continue operating with severe losses.

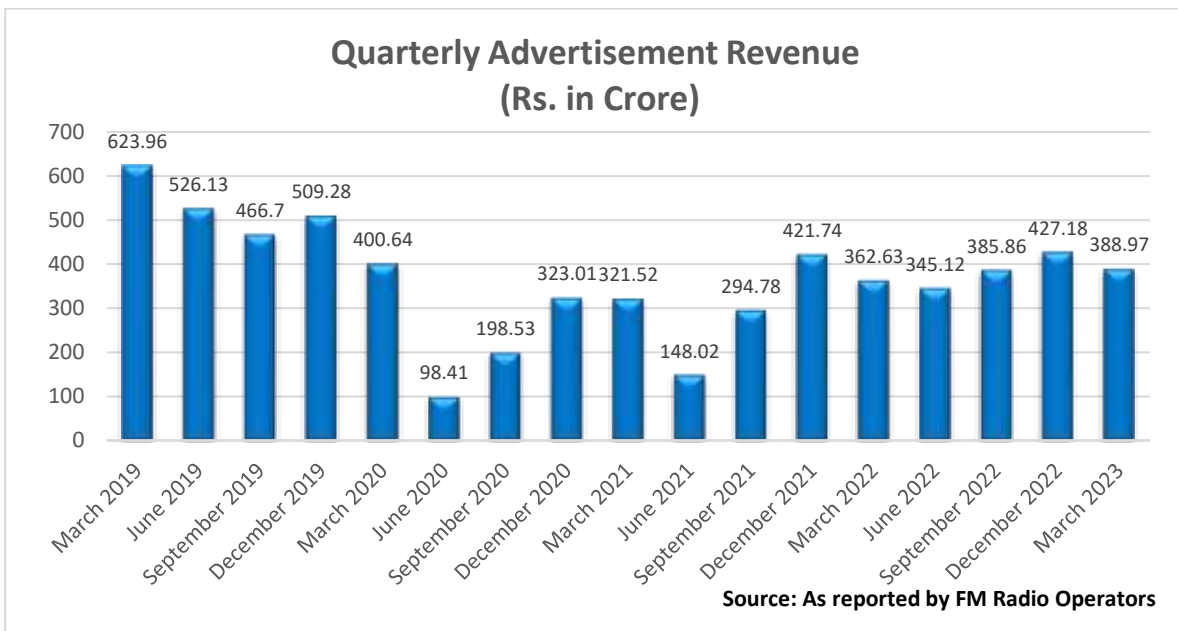
- 2.29 The stakeholders mentioned that broadcasters had to bear fixed costs such as tower rentals, license fee payments to the government, salaries for employees, and fees/royalties for content/music acquisition. Some stakeholders have also pointed out that the FM radio operators continued promoting government initiatives on a free-of-cost basis, including PM Modi's Mann Ki Baat and other public interest initiatives. These stakeholders also expressed their concern that the government did not provide any relief or reduction in license fees but instead demanded late payment fees and interest. This has further exacerbated the financial challenges faced by broadcasters.
- 2.30 Some stakeholders mentioned that the industry is projected to take an additional 3 to 4 years to regain its pre-pandemic revenue levels. They expressed concern that these substantial losses have resulted in employment losses, station closures, and the potential closure of over 50 more stations due to a lack of financial support for FM radio operators. Stakeholders suggested that extending the license period would provide an incentive for shareholders, stakeholders, and bankers to provide finance, thereby assisting the sector in surviving and recovering from the revenue lost during the past 3 years.
- 2.31 Some stakeholders suggested an extension of the existing permission period by two years. According to these stakeholders the impact from Covid – 19 was restricted to only for two years and extension beyond two years will not be in the public interest. One stakeholder stated that the quarterly revenue dip was there from June 2020 to September 2021 and at the most up to March 2022, so the extension in the period of permission should be 2 years. These stakeholders also suggested that extension should be granted as a very special case, and it should be one time extension only.

2.32 One stakeholder opposed any kind of extension pointing absence of provisions for extension in the Policy guidelines for FM Radio Phase III. He emphasized that since the rollout of FM Phase III provisions began in late 2015, there are still eight years remaining on the present permission, making an extension unnecessary in their view.

**Analysis**

2.33 The details of advertising revenue of private FM radio broadcasters, as reported to TRAI, for the last 17 quarters are given in figure 2.1 below. It is observed that the FM Radio sector did see a dip in revenues during the COVID period. However, the revenue trends indicate that the private FM Radio sector seems to have recovered after COVID.

**Figure 2.1: Quarterly growth in Advertisement Revenue of private FM Radio broadcasters**



2.34 After carefully examining the presented facts and figures, the Authority acknowledges the significant negative impact that the COVID-19 pandemic has had on the FM radio sector. It is also noted that pandemic is not the only reason for diminishing listenership and in-turn diminishing revenue of Radio

services. The Authority appreciates the commendable efforts of the radio industry in disseminating crucial information and providing entertainment during these challenging times.

2.35 The existing provisions related to period of permission provided in the Policy Guidelines for Phase-III of FM Radio is as below:

*“3. Period of Permission:*

*3.1 The Permission shall be valid for a period of fifteen (15) years from the effective date as defined below. There shall be no extension and the Permission, unless cancelled or revoked earlier, shall automatically lapse and expire at the end of the aforesaid fifteen years’ period and the Permission Holder shall thereafter have no rights whatsoever to continue to operate the Channel after the date of expiry of the Permission. Government at the appropriate time shall determine procedure for issue of fresh permissions.”*

The above provision states that no extensions of permission shall be granted.

2.36 The FM radio spectrum is a valuable resource obtained through a rigorous auction process. Spectrum acquired through auctions are allocated based on competitive bidding from multiple operators. The auction process ensures a fair and transparent distribution of the limited spectrum resource among potential license holders. Therefore, the licenses are only valid for a specific period (15 years in the case of Private FM channels). Extending these licenses beyond their specified validity periods could disrupt the equilibrium of the auction process, potentially leading to challenges related to competition and fairness. Therefore, the Authority is not in favour of extension of the exiting period of permission for FM radio operators.

2.37 The established validity period for spectrum licenses provides regulatory certainty for both operators and regulatory authorities. License holders plan their operations and investments based on the license duration. Also,

spectrum is a finite and valuable resource, and its allocation is carefully planned to ensure efficient use. Granting extensions to license holders beyond the original validity period could limit opportunities for new entrants or operators seeking to expand their services. This may reduce competition and innovation in the market, potentially affecting consumers negatively. Therefore, extending the license period in this scenario is not feasible.

2.38 The Authority also notes that eight years out of the original fifteen-year license period are still available. This remaining timeframe can be effectively utilized by license holders to recover from the financial losses incurred during the pandemic and regain stability within the industry.

2.39 Table 2 below provides instances of very high ALF due from some FM Radio operators. In all these cases, the provision of license fee as 2.5 % of NOTEF becomes applicable as license fee on realized revenue is lesser. In some cases, ALF is more than the annual revenue of the operators. While the Authority upholds the principle of adhering to the specified license period, it also recognizes the need to provide some relief to the FM radio industry in light of the circumstances brought about by the pandemic. The industry has faced immense hardships, including reduced advertising revenue, operational difficulties, and a decline in listenership due to changing habits and restrictions imposed during the pandemic. However, it may be mentioned that the responsibility of implementing measures to provide relief to the industry rests with the Government.

**Table 2: Example of Some Cases of Very High Annual License Fee<sup>4</sup>**

<b>Delhi</b>													
S. NO.	COMPANY	GROSS REVENUE 2018-19	ALF RECEIVED 2018-19	ALF as %age of GR	GROSS REVENUE 2019-20	ALF RECEIVED 2019-20	ALF as %age of GR	GROSS REVENUE 2020-21	TOTAL ALF RECEIVED 2020-21	ALF as %age of GR	GROSS REVENUE 2021-22	ALF Due 2021-22	ALF Due as %age of GR
1	Operator 1	208749789	42292238	20.26	194657780	42292237	21.73	41888288	42292237	<b>100.96</b>	72551361	42292237	<b>58.29</b>
2	Operator 2	205221825	42292236	20.61	201744742	42292236	20.96	40163746	42292237	<b>105.30</b>	72694976	42292237	<b>58.18</b>
<b>Chennai</b>													
1	Operator 1	43728947	13347088	<b>30.52</b>	23441368	13347088	<b>56.94</b>	20270990	13347087	<b>65.84</b>	33480382	13347087	<b>39.87</b>
2	Operator 2	126781197	13347087	10.53	83492643	13347087	15.99	38466926	13347086	<b>34.70</b>	40548248	13347087	<b>32.92</b>
<b>Mumbai</b>													
1	Operator 1	73448063	30703284	<b>41.80</b>	53561740	30703284	<b>57.32</b>	11110887	30703284	<b>276.34</b>	9228035	30703284	<b>332.72</b>
2	Operator 2	112445207	30703286	27.31	81936600	30703284	<b>37.47</b>	27013517	30703284	<b>113.66</b>	50515435	30703284	<b>60.78</b>
3	Operator 3	125643000	30703284	24.44	81254000	30703284	<b>37.79</b>	18500000	30703284	<b>165.96</b>	14837000	30703284	<b>206.94</b>
<b>Ahmedabad</b>													
1	Operator 1	64552070	10671908	16.53	47069974	10671908	22.67	16192964	10671908	<b>65.90</b>	23583670	10671907	<b>45.25</b>
<b>Bengaluru</b>													
1	Operator 1	211754342	27313640	12.90	161700948	27313640	16.89	50165713	27313640	<b>54.45</b>	53232896	27313639	<b>51.31</b>
2	Operator 2	185572000	27313640	14.72	119000000	27313639	22.95	48216000	22485230	<b>46.63</b>	48609000	27313639	<b>56.19</b>
3	Operator 3	167732730	27313640	16.28	96873871	27313640	28.20	37847956	27313639	<b>72.17</b>	65443906	27313639	<b>41.74</b>
<b>Hyderabad</b>													
1	Operator 1	13002188	4500000	<b>34.61</b>	10481273	4500000	<b>42.93</b>	3024788	4500000	<b>148.77</b>	9721987	4500000	<b>46.29</b>
<b>Jaipur</b>													
1	Operator 1	15915222	7087460	<b>44.53</b>	11145670	7087460	<b>63.59</b>	11304323	7087460	<b>62.70</b>	15687597	7087460	<b>45.18</b>
<b>Pune</b>													
1	Operator 1	54596288	10508756	19.25	50003285	10508756	21.02	16699286	10508756	<b>62.93</b>	17285914	10508757	<b>60.79</b>
<b>Lucknow</b>													
1	Operator 1	16320186	3501376	21.45	13663860	3501376	25.63	7127769	3501376	<b>49.12</b>	7294199	3501375	<b>48.00</b>

2.40 The Government is fully aware of the status of the FM Radio sector and has comprehensive knowledge of the industry's dynamics. Further, as done by few other Ministries, MIB has power to enact policies to enable stakeholders in addressing the challenges faced due to global pandemic. The Authority is of the view that the government is best suited to provide necessary relief measures. The government may take appropriate measures to alleviate the challenges of the FM radio industry by offering an appropriate package or one time policy initiative.

<sup>4</sup> As per information from MIB vide their letter number N-38032/43/2021-FM/89 dated 24<sup>th</sup> February 2022 and N-38032/43/2021-FM/39 dated 17<sup>th</sup> January 2023

2.41 **The Authority recommends that the Government may take appropriate measures to provide relief to the FM radio operators to address challenges posed due to COVID-19 pandemic.**

### **C. Broadcast of independent news bulletins by private FM Radio channels**

2.42 According to the provisions outlined in Phase III policy guidelines, private FM radio broadcasters have the permission to broadcast All India Radio's news bulletins without any alterations. However, they are not allowed to air any other news or current affairs programs. As of now, the FM Radio operators are allowed to share information related to local events and local issues like traffic blockade, examination updates, utility services update etc. Various stakeholders have expressed their viewpoint that FM radio broadcasters should be granted the ability to broadcast news and current affairs in the same manner as in case of Prasar Bharati Radio Channels or news and current affairs television channels. Accordingly in the CP, stakeholders were requested to provide their input on whether there is a necessity to evaluate the existing Policy guidelines concerning news and current affairs broadcasted on private FM radio stations. If there is indeed a requirement for review, stakeholders were requested to provide detailed justification, including the additional compliance/ reporting (if any), duration of news and current affair programmes and method of effective monitoring.

#### **Stakeholders' Response**

2.43 In response the majority of the stakeholders have suggested that the restriction on the broadcast of news and current affairs content via radio should be reviewed and relaxed. Some stakeholders have mentioned that the ongoing restriction on the broadcast of news and current affairs content on radio is a direct violation of the constitutional rights of FM radio broadcasters. They have argued that Article 19(1)(a) of the Constitution guarantees not only the right to disseminate information but also the right to receive information.



These stakeholders have further mentioned that the freedom of the press implies that the decision of what gets published in the editorial or news-columns of a newspaper should lie with the editor, rather than any public official or the government. They are of the view that the same principle should extend to private FM radio as well.

- 2.44 Some stakeholders have mentioned that private radio broadcasters, operating through their FM stations, hold a vital role in uplifting society and providing educational content to the masses. They are of the view that the monopoly of All India Radio (AIR) over news content imposes limitations on radio listeners, depriving them of diverse sources of news. According to these stakeholders, AIR's news broadcasts are confined to a mere 20-30 major languages and transmitted through 47 stations. This situation poses a challenge for illiterate and socio-economically disadvantaged population, who rely on radio news as their sole means of acquiring information. These stakeholders have further stated that in contrast, private FM radio operators possess individual radio stations in more than 100 cities in the country. This enables them to establish real-time communication, employing local languages and dialects, and fostering an unmatched local connection. These stakeholders are of the view that private FM radio broadcasters can deliver news that is highly relevant to local audiences without imposing any cost burden on them.
- 2.45 As per submission by few stakeholders, permission for news and current affairs would be beneficial in easing the burden of music royalties on radio broadcasters. They have mentioned that FM broadcasters heavily rely on music content, resulting in significant royalty payments to music licensors. These payments are often based on the number of hours of music played. According to one stakeholder, expanding the scope of talk-radio (including radio news) would enhance the market for radio advertising, similar to TV channels. Some stakeholders have suggested that dedicated channels may be allowed to broadcast live sporting events, news, interviews and other sports

related content that would help in taking the sports, including the not so famous ones, to the masses.

- 2.46 Some other stakeholders are of the view that the regulations as applicable to TV and other mediums should be considered for news on radio as well. One stakeholder has mentioned that the Broadcast Engineering Consultants India Limited (BECIL) is already monitoring radio broadcasts in most cities, and this monitoring is deemed sufficient in large metros.
- 2.47 Stakeholders have suggested that the duration of news and current affairs programs should be left to each broadcaster, aligning with the programming format that is most beneficial to their business model and the public interest. They have also suggested that the compliance with the All-India Radio Program Code, which is already part of Phase-III permission agreement, can ensure adherence.
- 2.48 To address potential misinformation, some stakeholders have suggested that FM radio operators should be allowed to establish a self-regulatory body similar to the NBSA. They have also suggested that radio operators should be permitted to source news from registered news agencies like the Press Trust of India (PTI) and the Asian News International (ANI). Furthermore, stakeholders have suggested that AIR news content should be made available to private FM radio broadcasters free of cost.
- 2.49 Another stakeholder suggested that the program code for news and current affairs should contain pointers regarding impartial reporting; ensuring that crime reporting does not glorify crime and violence; safeguarding the privacy of the individual subjects of the news; refraining from advocating superstitions and unscientific believes; and refraining from any content that pertains to unlawful activities under article 19(2).

2.50 One suggestion put forth by a stakeholder is to limit the total duration of news to 15 to 20 minutes per day. He has further suggested that in order to ensure the authenticity of the news, broadcasters could be required to record their news programs and periodically send them to the government for verification.

### **Analysis**

2.51 The Authority acknowledges the inherent potential of FM radio to serve as a powerful medium for communication, especially when it comes to broadcasting content in local languages. This unique characteristic of FM radio enables it to establish a strong connection with diverse communities, including those who are economically marginalized and disadvantaged.

2.52 The Authority also recognizes the significance of granting access to diverse news and views through current affairs programming for the general public. It firmly believes that individuals have a right to be informed and updated about the events and developments taking place within their surroundings and beyond.

2.53 Accordingly, the Authority is of the view that private FM broadcasters should be allowed to broadcast news and current affairs bulletins independent of All India Radio. Allowing private FM stations to include news and current affairs is expected to foster a more pluralistic media landscape.

2.54 By extending the scope of news and current affairs programming on private FM radio, the Authority aims to facilitate a comprehensive flow of information and promote the democratization of media access. It recognizes the potential of FM radio to bridge the information gap, particularly in rural areas where access to television sets and newspapers may be limited. Similarly, even in cities, marginal workers (like drivers, rikshaw-pliers, artisans etc.) do not have access to television or other medium during their working hours. However, in many instances, they may have access to radio. The Authority firmly believes

that enabling private FM broadcasters to air news and current affairs content will serve the interests of masses, providing them with a vital source of news, knowledge, and infotainment.

2.55 To ensure responsible broadcasting practices, the Authority underlines the requirement for private FM broadcasters to comply with a code of compliance similar to that applicable to other media platforms, such as television and digital mediums. This code of compliance should encompass a range of essential aspects, including adherence to ethical standards, accuracy in reporting, impartiality, and the avoidance of content that may provoke violence, hatred, or misinformation. Therefore, the code of conduct applicable to All-India Radio should also be extended and applied to the private FM stations.

2.56 In order to strike a balance between allowing access to important news updates and preventing the undue exploitation of this privilege, the Authority is of the view that news content should be limited to 10 minutes per clock hour. By setting a limit of 10 minutes per hour for news content during the initial implementation phase, the Authority aims to mitigate the potential misuse of this provision and large-scale change of character of Radio services. This provision may be reviewed and revised in the future. Further, in order to establish a comprehensive policy for continuous news broadcasting, specific guidelines can be considered in future for radio channels solely dedicated to news and current affairs.

2.57 **The Authority recommends that:**

- i. Private FM Radio Operators should be allowed to broadcast news and current affairs programs, limited to 10 minutes in each clock hour.**
- ii. The program code of conduct as applicable to All India Radio for news content may also be applied to Private FM Radio channels.**

#### **D. Availability of FM Radio Receivers in Mobile Handsets**

- 2.58 Initially for listening to FM Radio channels, standalone radio receivers were used. With the advancement of technology, FM radio receivers were integrated with Mobile handsets. This helped in expanding the reach of the FM Radio channels and hence resulted in the growth of the FM Radio sector. As per industry experts, the availability of FM Radio receivers in mobile handsets helped in bringing a young audience. Stakeholders have represented that ‘with the introduction of 4G handsets, device manufacturers and operating system (iOS, Android) are turning the FM tuners off, possibly to support their music streaming services’.
- 2.59 During disasters or to communicate with the larger public during emergencies, local FM radio broadcasting facilities become a reliable means of communication. FM broadcasting is amongst the most reliable of services available that can cater to broader public use. Countries worldwide have realized the utility and reliability of private FM broadcasting services in reaching people during critical times. However, on the receiver side, mobile handset is most pervasive. In view of these observations, FM Radio operators have requested to make it mandatory to have active FM radio receivers in mobile handsets.
- 2.60 Radio continues to remain the device that connects the masses. Availability of radio receiver on the Mobile handset enables the poorest of poor as they could connect to radio without needing to spend on an additional device. Therefore, it enables inclusion of marginalised sections too. Moreover, as regard the issue of disseminating information regarding Agriculture extension, education extension, health etc., Radio plays an important role. In India, proliferation of Community radio is also negligible with about 400 Community radio stations. Availability of Radio Receiver on Mobile Handset is expected to enable expansion of community radio services in a big way. Radio reception is

available free of cost to the user without necessitating subscribing to data plan from Telecom Service Providers. Therefore, availability of Radio will enable use of radio by the poorest of poor at no cost.

2.61 TRAI has also looked into the issue from Mobile Handset manufacturers' perspective. It is observed that until 2018-19 quite-a-few mobile handsets included an FM Radio App. Such FM Radio App was either provided by Mobile Handset Manufacture or was available for download. However, such apps are now not available on Google Play-Store or Apple App-Store.

2.62 Considering the extensive coverage and benefits of radio, as well as the decreasing availability of mobile handsets with FM radio receivers, stakeholders in the CP, were posed with the question of whether it is necessary to enforce a requirement that all mobile handsets manufactured or sold in India must include an integrated FM radio receiver. In response, stakeholders were requested to provide comprehensive justifications for their comments.

### **Stakeholders' comments**

2.63 Some stakeholders, mainly FM radio broadcasters, are in favour of mandatory requirement to include an integrated FM radio receiver in all mobile handsets manufactured or sold in India. These stakeholders have provided following arguments in their support:

- FM radio plays an important role as a robust and reliable communication system, especially during disasters when other modes of communication may fail. During Hurricane Maria in Puerto Rico, radio played a crucial role.
- FM radio offers significant energy efficiency advantages compared to Wi-Fi and Bluetooth. An FM receiver consumes around 15 mW, whereas Wi-Fi and Bluetooth typically consume over 400 mW and 150 mW, respectively.

- FM signals are less affected by minor influences, making them more reliable in adverse weather or challenging terrains. As the frequency increases, radio waves face increased attenuation by obstacles and therefore, FM signals, being lower in frequency, can penetrate obstacles more easily than Wi-Fi or GSM.
- Police, fire, and other rescue services extensively rely on FM radio, utilizing special frequencies for their operations.
- FM signals are broadcasted from a single transmitter which are located within well-protected and well-maintained facilities, ensuring their reliability during emergencies.
- FM radio is well-suited for providing minute-by-minute updates on the evolving situation in a specific city or district.
- Radio jockeys (RJs) who speak in local vernacular languages can effectively communicate with the population.
- Listeners can access FM radio through various devices, including mobile phones, car stereos, ordinary transistors, modern smart speakers like Alexa and Google Home, and even television sets.
- Requiring mobile handset manufacturers to mandatorily insert an FM Radio receiver will allow the convenience of receiving the radio broadcast signals without having to pay for an extra device. This would particularly benefit the population in villages and remote areas, who seek entertainment without the complexity of OTT platforms.
- Having FM radio on mobile phones serves the information, entertainment, and educational needs of the underprivileged section of society, providing a vital resource.
- Major US carriers and manufacturers like Samsung, LG, HTC, and Motorola have already activated FM radio functionality on their phones.
- Decline in mobile handsets with FM functionality coincided with the entry of popular OTT services such as Apple Music, Amazon Music, Spotify, and Wynk, which were pre-loaded on various handsets.

- Anyone can easily turn their mobile phone into an FM radio if it has an embedded chipset and the necessary circuitry to connect to an FM antenna.
- A data from 2019, indicate that basic models of smartphones, which do not carry pre-loaded music apps, still include FM tuners. However, high-end smartphones used in Tier-I cities, where subscription-based music OTT services are popular, have stopped featuring FM functionalities.
- Dominance of online music streaming platforms and the removal of the 3.5mm headphone jack from handsets have contributed to the decline of conventional radio and FM functionality in mobile devices.
- If conventional radio is to survive, it is essential for all phones and car entertainment systems to be equipped with FM radio receivers. Without this mandate, the future of FM radio as currently known is at risk.

2.64 Some stakeholders, mainly associations of mobile phone manufacturers are not in favour of mandatory requirement to include an integrated FM radio receiver in all mobile handsets manufactured or sold in India. These stakeholders have provided following arguments in their support:

- It would significantly increase the cost of manufacturing wireless devices, impacting consumers who would end up paying more for functionality they may not desire or use.
- Incorporating FM chips into mobile devices poses challenges in terms of size and technical design. As devices become more advanced, space for additional chips and antennas becomes limited.
- Accommodating the significant differences between FM signal wavelengths and cellular signal wavelengths would require a separate antenna, potentially limiting the inclusion of other functionalities that consumers may value more.



- Attaching a long wire antenna to the electronics can cause various electromagnetic compatibility (EMC) issues, including reduced immunity to radio frequency (RF) and electrostatic discharge (ESD).
- Inclusion of costly filters specific to different geographic regions would increase the cost, weight, and size of the final device.
- Alternative solutions for disaster management are already in development. Department of Telecommunications (DoT) and the Ministry of Electronics and Information Technology (MeitY) have been working with the industry to establish a mobile broadcast emergency alerting system, known as Cell Broadcast. Stakeholders have highlighted that this system will be compatible with current and future mobile air interfaces, enabling targeted real-time delivery of government-approved alerts.
- There are ongoing discussions with mobile OEMs to implement India's satellite-based navigation system, NavIC, to enhance navigation and aid in disaster situations.
- Mandating FM chips in mobile devices could interfere with market forces and hinder innovation. Imposing hardware design mandates would disrupt market dynamics and impede innovation and technological growth.
- Success of the mobile phone marketplace has been driven by allowing consumers to choose the functions and features of their devices.
- Mobile devices are designed for the worldwide market, with the same models being sold globally. Introducing unique design requirements specific to India, such as FM broadcast support, could adversely affect the country's mobile manufacturing efforts. Aligning Indian standards with global trends will enhance the export potential of mobile devices designed for the global market.
- Consumers already have a wide range of options to access FM programs through numerous apps and internet radio stations. These alternatives

provide consumers with ample choices, rather than imposing a feature that may not be in high demand.

- Major chipset manufacturers, such as Qualcomm and MediaTek, have excluded FM radio features from their chipsets as the industry moves towards 4G and 5G technologies.
- Countries like Mexico and Brazil mandate only those mobile devices that are already equipped with the essential components to provide FM receiver functionality. In such cases, the FM feature can be enabled and activated for the user without any limitations.
- The FM radio sector, which is relatively small, should not dictate requirements to the much larger mobile telecom sector.
- An FM chip would provide a materially inferior means of providing real-time alerts to mobile consumers. The existence of an FM chip in a mobile device does not guarantee that a consumer would be tuned to a station broadcasting an announcement about an impending danger.
- India has effectively dealt with many emergencies and situations without relying solely on private FM radio and mobile devices. The presence of established systems and processes on the ground that enable effective handling of emergencies without the need for mandating FM chips in mobile phones.
- Mandating the inclusion of FM chips in mobile devices would undermine India's "Ease of Doing Business" policy measure, which aims to attract mobile manufacturers to produce in India.
- Such a mandate would run counter to the government's policy of attracting foreign capital to the mobile sector and may reduce India's competitiveness in the industry.

2.65 One stakeholder in its counter comments has mentioned the following:

- Objections raised against FM functionality on mobile handsets, lack supporting data and are based on mere hypotheses.

- There is no need for design modifications or internal antennas, as C-type add-on connector/ or wired headsets with C-Type pins/ or even a charging wire can still be connected to charging points on Android smartphones.
- 98% of mobiles in the United States have either active or ready-to-activate FM receiver capabilities.

## **Analysis**

2.66 Radio continues to serve as a powerful medium for connecting with the masses, bridging gaps, and fostering inclusivity. Its significance is particularly evident during disasters and emergencies, where radio provides a reliable source of information and communication. Recognising the immense value of integrating a radio receiver into mobile handsets, especially for economically disadvantaged individuals, the Authority acknowledges the numerous benefits that this inclusion brings.

2.67 By incorporating a radio receiver into mobile handsets, individuals who are financially underprivileged can now access radio programming without the need to invest in an additional device. This accessibility is particularly crucial as radio offers a wide range of content, including news, entertainment, educational programs, and agricultural or health-related information. It serves as a valuable source of knowledge and empowerment for those who may not have access to other forms of media. Furthermore, by enabling free radio reception without the requirement for costly data plans from Telecom Service Providers, individuals at the lowest socio-economic strata can enjoy infotainment and entertainment.

2.68 The seamless accessibility to radio content can be enabling in number of circumstances including local information and alerts. By ensuring that every mobile handset is equipped with a built-in radio receiver, the most economically disadvantaged individuals can be empowered to enjoy the

advantages of radio without any financial burden. This not only promotes inclusivity but also recognizes the transformative potential that radio holds in uplifting communities and enhancing their well-being.

2.69 In line with this recognition, the Ministry of Electronics and Information Technology (MeitY) recently released an advisory to ICEA and MAIT on 28th April 2023. The advisory emphasizes the importance of ensuring that mobile phones equipped with built-in FM radio receiver functions or features are not disabled or deactivated. The advisory urges that these functions or features remain enabled and activated in the mobile phones, promoting widespread access to radio content. An excerpt from the advisory is provided below:

*“2. The FM broadcast is a robust and reliable communication system. FM stations serve as important communication links between the local authorities and people in times of natural disasters (i.e., in catastrophic situations). As per International Telecommunication Union (ITU) - "In times of emergencies and disaster, Radio broadcasting is one of the most powerful and effective ways of delivering early warnings and alerting the public to save lives". Further, there is need for speedy, timely, and reliable communication via FM enabled mobile phones (apart from regular standalone Radio sets and car receivers) during disasters as this can save precious lives, livelihood and also prepares us better to deal with the disasters. The availability of vast network of FM transmitters and FM radio in the country played a key role in India's fight against the COVID-19 pandemic.*

*3. In view of the above, it should be ensured that wherever the mobile phone is equipped with an inbuilt FM Radio receiver function or feature, that function or feature is not disabled or deactivated but is kept enabled / activated in the mobile phone. Further, it is advised that if the FM Radio receiver function or feature is not available in the mobile phones, it may be included.”*

- 2.70 The Authority is in agreement with the rationale of the advisory issued by MeitY. The advisory amply recognizes the importance of FM radio functionality in mobile handsets. It promotes unhindered access to FM radio for the masses. The advisory emphasizes that the built-in FM radio receiver functions or features must not be subjected to any form of disablement or deactivation. Instead, it stresses the need for these functions or features to remain enabled and activated on all mobile phones having the necessary hardware.
- 2.71 The authority feels that the said advisory may be appropriately reviewed to make the feature mandatory. It should be mandatory that the manufacturer or the importer activates the FM Radio utility in every such mobile handset that has built-in FM Radio receiver functionality.
- 2.72 In order to ensure the effective implementation of, the Authority considers that a standing committee may be constituted by MeitY to oversee the compliance is required. This committee should be responsible for overseeing and monitoring compliance by all the mobile phone manufacturers/ importers. To ensure stakeholders' representation, the committee may include key stakeholders such as MIB, AROI, MAIT, and ICEA.
- 2.73 The committee's scope of work should include conducting comprehensive research to ascertain whether the advisory alone is sufficient to achieve the desired outcomes. Specifically, the committee would evaluate the feasibility and effectiveness of implementing a mandate that obligates mobile phone manufacturers to include FM radio in their devices. This would take into account various factors such as technological feasibility, market demand, potential benefits, and any associated challenges. By conducting thorough research and analysis, the committee should take measures regarding the implementation of the mandate of inclusion of FM radio on mobile handsets. This would help avoid relying solely on the advisory, which may not have the

desired impact on its own. The committee's assessments would consider the broader implications of such a mandate, including its impact on consumers, manufacturers, and the overall mobile phone industry.

2.74 Furthermore, in a proactive approach towards transparency and grievance redressal, the authority proposes to introduce an online portal. This portal will enable the public to submit complaints if they come across instances where the radio functionality is not enabled in equipped mobile phones as mandated. By providing a platform for public input, the Authority aims to ensure accountability and encourage adherence to the advisory, ultimately promoting the widespread availability of FM radio receivers in mobile devices across the country.

2.75 **The Authority recommends that:**

- i. Functions or features pertaining to FM radio should remain enabled and activated on all mobile handsets having the necessary hardware. Built-in FM radio receiver in mobile handset must not be subjected to any form of disablement or deactivation.**
- ii. A Standing Committee, headed by a senior officer of Joint Secretary or above level, to oversee and monitor the compliance of enabling the FM Radio in Mobile Handsets (as per (i) above) by mobile phone manufacturers (or importers) may be established by MeitY. The committee should include key stakeholders such as MIB, AROI, MAIT, and ICEA.**
- iii. An online grievance redressal portal should be provided for submitting information or complaints of case of any non-compliance as regards enablement of FM radio functionality in such mobile handsets that have the necessary functionality for FM receivers.**

## **Chapter III**

### **Summary of Recommendations**

- 3.1 The Authority recommends that the annual license fee of a FM radio channel should be de-linked from Non-Refundable One Time Entry Fee (NOTEF). The license fee should be calculated as 4% of the Gross Revenue (GR) of the FM radio channel during the respective financial year. GST should be excluded from Gross Revenue (GR).**
- 3.2 The Authority recommends that the Government may take appropriate measures to provide relief to the FM radio operators to address challenges posed due to COVID-19 pandemic.**
- 3.3 The Authority recommends that:**
- i. Private FM Radio Operators should be allowed to broadcast news and current affairs programs, limited to 10 minutes in each clock hour.**
  - ii. The program code of conduct as applicable to All India Radio for news content may also be applied to Private FM Radio channels.**
- 3.4 The Authority recommends that:**
- i. Functions or features pertaining to FM radio should remain enabled and activated on all mobile handsets having the necessary hardware. Built-in FM radio receiver in mobile handset must not be subjected to any form of disablement or deactivation.**
  - ii. A Standing Committee, headed by a senior officer of Joint Secretary or above level, to oversee and monitor the compliance of enabling the FM Radio in Mobile Handsets (as per (i) above) by mobile phone manufacturers (or importers) may be established by**

**MeitY. The committee should include key stakeholders such as MIB, AROI, MAIT, and ICEA.**

- iii. An online grievance redressal portal should be provided for submitting information or complaints of case of any non-compliance as regards enablement of FM radio functionality in such mobile handsets that have the necessary functionality for FM receivers.**



**Annexure I**

**Reserve Prices for e-Auction of 2nd batch of FM Radio Phase-III Channels**

S.No	Name of the New City	State	Category	MIB Reserve Price (INR)	TRAI's recommended Reserve Price (INR)
1	Achalpur	Maharashtra	D	1,71,00,000	1,24,00,000
2	Alappuzha (Alleppey)	Kerala	C	7,02,00,100	4,23,00,000
3	Amravati	Maharashtra	C	3,51,00,000	3,10,00,000
4	Barshi	Maharashtra	D	1,71,00,000	1,24,00,000
5	Belgaum	Karnataka	C	7,02,00,100	2,68,00,000
6	Bellary	Karnataka	C	7,02,00,100	2,68,00,000
7	Belonia	Tripura	Oth	5,00,000	5,00,000
8	Bhaderwah	J & K	Oth	5,00,000	5,00,000
9	Bharuch	Gujrat	D	1,71,00,000	1,24,00,000
10	Bhavnagar	Gujrat	C	3,51,00,000	3,10,00,000
11	Botad	Gujrat	D	1,71,00,000	1,24,00,000
12	Burhanpur	Madhya pradesh	D	1,71,00,000	66,00,000
13	Chattarpur	Madhya pradesh	D	1,71,00,000	66,00,000
14	Chhindwara	Madhya pradesh	D	1,71,00,000	66,00,000
15	Dahod	Gujrat	D	1,71,00,000	1,24,00,000
16	Damoh	Madhya pradesh	D	1,71,00,000	66,00,000
17	Dehradun	Uttarakhand	C	15,61,00,590	4,48,00,000
18	Devengeri	Karnataka	C	7,02,00,100	2,68,00,000
19	Dubhri	Assam	Oth	5,00,000	5,00,000
20	Durg-Bhillainagar	Chhattisgarh	D	1,71,00,000	42,00,000
21	Erode	Tamil Nadu	C	7,02,00,100	4,23,00,000
22	Godhra	Gujrat	D	1,71,00,000	1,24,00,000
23	Gondiya	Maharashtra	D	1,71,00,000	1,24,00,000
24	Guna	Madhya pradesh	D	1,71,00,000	66,00,000
25	Haflong	Assam	Oth	5,00,000	5,00,000
26	Hubli-Dharwad	Karnataka	C	7,02,00,100	2,68,00,000
27	Itarsi	Madhya pradesh	D	1,71,00,000	66,00,000
28	Jagdapur	Chhattisgarh	D	1,71,00,000	42,00,000
29	Jamnagar	Gujrat	C	3,51,00,000	3,10,00,000
30	Jetpur Navagadh	Gujrat	D	1,71,00,000	1,24,00,000
31	Jowai	Meghalaya	Oth	5,00,000	5,00,000
32	Junagadh	Gujrat	D	1,71,00,000	1,24,00,000
33	Kakinada	Andhra Pradesh	C	7,02,00,100	2,14,00,000
34	Kargil	J & K	Oth	5,00,000	5,00,000
35	Kathua	J & K	Oth	5,00,000	5,00,000

36	Khandwa	Madhya pradesh	D	1,71,00,000	66,00,000
37	Khargone	Madhya pradesh	D	1,71,00,000	66,00,000
38	Korba	Chhattisgarh	D	1,71,00,000	42,00,000
39	Kurnool	Andhra Pradesh	C	7,02,00,100	2,14,00,000
40	Leh	J & K	Oth	5,00,000	5,00,000
41	Lung-lei	Mizoram	Oth	5,00,000	5,00,000
42	Malegaon	Maharashtra	C	3,51,00,000	3,10,00,000
43	Mandsaur	Madhya pradesh	D	1,71,00,000	66,00,000
44	Mehsana	Gujrat	D	1,71,00,000	1,24,00,000
45	Mokukchung	Nagaland	Oth	5,00,000	5,00,000
46	Murwara (Katni)	Madhya pradesh	D	1,71,00,000	66,00,000
47	Muzaffarnagar	Uttar Pradesh	C	15,61,00,590	1,30,00,000
48	Neemuch	Madhya pradesh	D	1,71,00,000	66,00,000
49	Nellore	Andhra Pradesh	C	7,02,00,100	2,14,00,000
50	Palanpur	Gujrat	D	1,71,00,000	1,24,00,000
51	Patan	Gujrat	D	1,71,00,000	1,24,00,000
52	Poonch	J & K	Oth	5,00,000	5,00,000
53	Porbandar	Gujrat	D	1,71,00,000	1,24,00,000
54	Raigarh	Chhattisgarh	D	1,71,00,000	42,00,000
55	Ratlam	Madhya pradesh	D	1,71,00,000	66,00,000
56	Rewa	Madhya pradesh	D	1,71,00,000	66,00,000
57	Saharanpur	Uttar pradesh	C	15,61,00,590	1,30,00,000
58	Salem	Tamil Nadu	C	7,02,00,100	4,23,00,000
59	Satna	Madhya pradesh	D	1,71,00,000	66,00,000
60	Shahjahanpur	Uttar Pradesh	C	15,61,00,590	1,30,00,000
61	Shivpuri	Madhya pradesh	D	1,71,00,000	66,00,000
62	Singrauli	Madhya pradesh	D	1,71,00,000	66,00,000
63	Surendranagar Dudhrej	Gujrat	D	1,71,00,000	1,24,00,000
64	Ujjain	Madhya pradesh	C	3,51,00,000	1,40,00,000
65	Vellore	Tamil Nadu	C	7,02,00,100	4,23,00,000
66	Veraval	Gujrat	D	1,71,00,000	1,24,00,000
67	Vidisha	Madhya pradesh	D	1,71,00,000	66,00,000
68	Wardha	Maharashtra	D	1,71,00,000	1,24,00,000
69	Yavatmal	Maharashtra	D	1,71,00,000	1,24,00,000

MIB reference dated 11<sup>th</sup> May 2022

संजीव शंकर, (भा.सा.से.)  
संयुक्त सचिव (प्रसारण)  
SANJIV SHANKAR, IRS  
Joint Secretary (Broadcasting)



भारत सरकार  
सूचना एवं प्रसारण मंत्रालय  
शास्त्री भवन, नई दिल्ली - 110115  
GOVERNMENT OF INDIA  
MINISTRY OF  
INFORMATION & BROADCASTING  
SHASTRI BHAWAN, NEW DELHI - 110115

D.O.N-38032/43/2021-FM/329

Date: 11<sup>th</sup> May, 2022

Dear *Shri V. Raghunandan,*

Please refer to this Ministry's letter of even no. dated 30<sup>th</sup> November, 2021 seeking recommendations of TRAI on the following two issues raised by the Association of Radio Operators for India (AROI) in its letter dated 20.09.2021.

- i. Remove the linkage to Non-Refundable One Time Entry Fee (NOTEF) in the formula for annual fee as prescribed in the FM Ph-III Policy Guidelines dated 25.07.2011.
- ii. Extend the existing FM License period of 15 years by 3 years.

2. TRAI in its reply vide Letters No. R-11/3/(4)/2021-B&CS dated 30<sup>th</sup> December, 2021 and 21<sup>st</sup> March, 2022 has requested MIB to seek TRAI's recommendations for amending the terms and conditions in the existing policy guidelines for FM Radio (Phase-III), in accordance with the provisions contained under Section 11(1)(a)(ii) of the TRAI act, as deemed fit.

3. As indicated, AROI has flagged two urgent and short - term issues which according to them will drive the survival of the FM radio industry. AROI has also cited the FICCI-EY report of March, 2021 according to which it is not until FY 24 that radio is expected to go ahead of its FY 20 revenue levels. It is claimed that nearly 4 years of the 15-year license period has been affected by the pandemic.

4. In this context, it may be stated that though the Revenue levels of Private FM radio operators had dipped in FY 2020-21 compared to FY 2019-20, these levels started showing an upward trend from Q3 FY 21 onwards, once the Government eased the COVID-19 induced lockdown conditions and economy gradually started returning to normal. The Ministry vide its letter of even no. dated 24<sup>th</sup> February, 2022 has already provided TRAI with data on Gross Revenue and license fee paid by FM operators, city wise, during the past five years as well as NOTEF amount for each city.

5. Regarding extension in FM Ph-III License period of 15 years by 3 years, para 3.1 of the FM Phase-III policy inter-alia states as follows:



Room No. 545, 'A' Wing, Shastri Bhawan, New Delhi-110001  
Tele No. (O) : +91 11 2338 4453, Fax No. : +91 11 2338 7823  
E-mail : jsb-moib@gov.in

*"..There shall be no extension and the Permission, unless cancelled or revoked earlier, shall automatically lapse and expire at the end of the aforesaid fifteen years' period and the Permission Holder shall thereafter have no rights whatsoever to continue to operate the Channel after the date of expiry of the Permission. Government at the appropriate time shall determine procedure for issue of fresh permissions."*

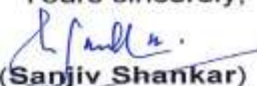
It may be mentioned that the FM Phase-III permissions began roll-out in late 2015 and only six years out of 15 years permission period have lapsed.

6. In view of the above, TRAI, is requested to examine the two issues raised by AROI and give its recommendations under section 11(1)(a) of TRAI act.

7. This reference to TRAI is being made after the approval of HMIB.

*With Best Regards,*

**Shri V. Raghunandan**  
Secretary,  
Telecom Regulatory Authority of India,  
Mahanagar Doorsanchar Bhawan,  
Jawaharlal Nehru Marg (Old Minto Road),  
New Delhi 110 002.

Yours sincerely,  
  
(**Sanjiv Shankar**)

MIB letter dated 27<sup>th</sup> January 2011

रघु मेनन  
सचिव  
RAGHU MENON  
SECRETARY  
Tel. : 011-23382639  
Fax. : 011-23383513



भारत सरकार  
सूचना और प्रसारण मंत्रालय  
नई दिल्ली-110115  
GOVERNMENT OF INDIA  
MINISTRY OF INFORMATION & BROADCASTING  
NEW DELHI-110115

170  
186

D.O.No.104/02/2008-FM (Vol-IV)

27<sup>th</sup> January, 2011

Dear Dr. Sarma,

Please refer to the then Chairman's, TRAI D.O letter No. 7-1/2007 –CN dated 22<sup>nd</sup> February 2008 forwarding therewith TRAI recommendations on 3<sup>rd</sup> Phase of Private FM Radio Broadcasting and subsequent letter of even number dated 28<sup>th</sup> November, 2008 in response to the Ministry's views on these recommendations which were sent as per provisions of Section 11(1) of TRAI Act, 1997 .

2. The Government, while considering FM Phase-III Policy, has constituted a Group of Minister (GoM) under the chairmanship of Finance Minister to examine appropriate methodology for FM Phase-III. The GoM, in its meeting held on 19.01.2011, considered three issues pertaining to FM Phase-III viz. (i) appropriate licensing methodology (ii) determination of reserve price and annual license fee and (iii) Permission period for Phase-III. The gist of the recommendations of the GoM is as under:

74/MID.  
3/11  
20-1  
3/11  
B. An (B. PA)  
1/2/11  
1/2/11  
1/2/11  
DA-II (B. Secs)

- (i) The GoM recommended that the ascending e-auction methodology as followed in 3G auctions may be adopted for award of license in FM Radio Phase-III.
- (ii) It has been recommend that for Phase-III, the reserve price for new channels in existing FM Phase-II cities may be fixed at the highest bid received for that city in Phase-II. In cities which were being taken up afresh, the reserve price could be pegged at the highest bid received during FM Phase-II for that category of cities in that region. In case the benchmark from Phase-II for a particular region was not available, then the lowest of the highest bid received in other regions for that category of cities may be taken as the reserve price. In case of non-availability of any benchmark on the basis of the above for a particular city, the Ministry of I&B could take a suitable decision.
- (iii) With regard to the determination of annual license fee for Phase-III, the GoM recommended that the same formula used for calculation of annual license fee for FM Phase-II should be followed in FM Phase-III as well i.e @ 4% of Gross Revenue (GR) or 10 % of Reserve One Time Entry Fee (25% of the highest bid) for the city, whichever is higher. For e-auction, this will translate to 4% of GR or 2.5% of the Bid price, whichever is higher, since every permission holder will be paying the same bid price.

...2/-

321  
3/11

13  
1/2/11

Office: (S. & C. Division)  
Sl. No. 222  
Date: 2.2.11

(185) 16/9

-2-

(iv) The period of permission in FM Phase-III could be 15 years. The Ministry of Information and Broadcasting would formulate a separate policy for the license period from the present 10 yrs to 15 yrs for FM (Phase-II) operators.

3. In the light of the above, the Authority may kindly furnish their further recommendations on the above issues in accordance with the provisions of the Section 11(1) of TRAI Act, 1997 so as to enable us to seek the approval of the Cabinet in the matter.

With regards,

Yours sincerely

  
(Raghu Menon)

Dr. J. S. Sarma  
Chairman  
The Telecom Regulatory Authority of India  
Mahanagar Doorsanchar Bhawan  
Jawaharlal Nehru Marg  
New Delhi- 110 002

Pr. Adv (CB-APA)

175  
2811

## TRAI letter dated 9th February 2011 to MIB



सत्यमेव जयोते

आर.के. आर्नोल्ड, भा.द.से.

R.K. ARNOLD, I.T.S.

सचिव / Secretary

भारतीय दूरसंचार विनियामक प्राधिकरण

महानगर दूरसंचार भवन, जवाहर लाल नेहरू मार्ग,  
(पुराना मिन्टो रोड), नई दिल्ली-110002

TELECOM REGULATORY AUTHORITY OF INDIA

Mahanager Doorsanchar Bhawan, Jawahar Lal Nehru Marg,  
(Old Minto Road), New Delhi-110002

Tel. : 91-11-23237448, Fax : 91-11-23222816

E-mail : secretary@traigou.in

D.O. No. 7-2/2008-B&amp;CS

February 9, 2011

Dear *Shri Menon*,

Please refer to your D.O. No. 140/02/2008-FM (Vol. IV), dt. 27.01.2011 addressed to Chairman, TRAI, forwarding the recommendations of the GoM constituted by the Government for the FM Phase-III policy and requesting the Authority to furnish further recommendations on the same.

2. The Authority has accorded careful consideration to each of the issues raised in para 2(i) to 2(iv) of your letter and the responses of the Authority to these issues are as follows:

(i) **Ascending e-auction methodology:**

Keeping in view the experience of multiple round auction methodology that was followed in the first phase as well as the recommendations of a committee under Dr. Amit Mitra, the then Secretary General, FICCI, TRAI had recommended in 2008 the 'closed tender process' for the award of licenses in the second phase of Private FM Radio Broadcasting.

However, in the context of the successful conduct of auctions for allocating 3G spectrum in 2010 and the recommendation of GoM mentioned in your letter, TRAI would have no objection regarding adoption of the 3G ascending e-auction methodology '*mutis mutandis*' for awarding licenses for FM Radio Phase III. It is also suggested that the Ministry of Information and Broadcasting may ensure that all related administrative issues are duly addressed while finalising the ecosystem and procedures for the e-auction process.

(ii) **Reserve price for new channels:**

The GoM has recommended reserve prices for new channels based on the actual prices received during the second Phase for comparable cities. The Authority has no objection to the proposed action.

(iii) **Annual Licence fee:**

This is in line with the Authority's earlier recommendations. The Authority agrees to the same.

: 2 :

231

**(iv) Period of licence:**

The Authority had earlier recommended issue of licenses for a period of ten years with a provision for its renewal for another ten years. Now the GoM has recommended a permission period of fifteen years. The Authority has no objection to this validity period of the licenses.

3. As per procedure, a copy of this letter is being placed on the TRAI website ([www.trai.gov.in](http://www.trai.gov.in)).

*With kind regards,*

Yours sincerely,



(R.K.Arnold)

10/10/11  
Shri Raghu Menon,  
Secretary,  
Ministry of Information and Broadcasting,  
Shastri Bhavan,  
New Delhi - 110 001



**Annexure V**

**Annual License Fee paid/due in Phase III by FM Radio operators in top 15 cities in terms of total revenue of the city in 2021-22**

<b>Delhi: RP (Highest Bid Phase II) - Rs. 31,42,00,000; Highest Bid Phase III (NOTEF) – Rs. 1,69,16,89,481</b>																
S. NO.	COMPANY	GROSS REVENUE 2017-18	TOTAL ALF RECEIVED 2017-18	ALF as % of GR	GROSS REVENUE 2018-19	TOTAL ALF RECEIVED 2018-19	ALF as %age of GR	GROSS REVENUE 2019-20	TOTAL ALF RECEIVED 2019-20	ALF as %age of GR	GROSS REVENUE 2020-21	TOTAL ALF RECEIVED 2020-21	ALF as %age of GR	GROSS REVENUE 2021-22	ALF Due 2021-22	ALF as %age of GR
1	Operator 1	214414693	42292236	19.72	200237614	42292237	21.12	230660190	42292236	18.34	152485281	42292237	27.74	117941280	42292237	<b>35.86</b>
2	Operator 2	692899295	42292239	6.10	727907619	42292236	5.81	617891044	42292237	6.84	315956130	42292236	13.39	444627681	42292237	9.51
3	Operator 3	920880493	42292236	4.59	841751910	42292236	5.02	765984503	42292236	5.52	305154040	42292236	13.86	448072719	42292237	9.44
4	Operator 4	735175560	42292238	5.75	721804508	42292238	5.86	595789069	42292237	7.10	198491059	42263921	21.29	327559290	42292237	12.91
5	Operator 5	222070521	42292238	19.04	208749789	42292238	20.26	194657780	42292237	21.73	41888288	42292237	<b>100.96</b>	72551361	42292237	<b>58.29</b>
6	Operator 6	544476028	42292237	7.77	605944287	42292237	6.98	512374322	42292238	8.25	234415378	42292237	18.04	329905083	42292237	12.82
7	Operator 7	217320000	42292236	19.46	205221825	42292236	20.61	201744742	42292236	20.96	40163746	42292237	<b>105.30</b>	72694976	42292237	<b>58.18</b>
8	Operator 8	444922233	42292237	9.51	462640878	42292237	9.14	386257472	42292237	10.95	177130704	42292238	23.88	258555052	42292237	16.36
9	Operator 9	176757000	42292236	23.93	183272000	42292236	23.08	94776000	42292236	<b>44.62</b>	38200000	42292236	<b>110.71</b>	169207000	42292237	24.99

<b>Mumbai: RP (Highest Bid Phase II) - Rs. 35,20,01,004 ; Highest Bid Phase III(NOTEF) – Rs. 1,22,81,31,349</b>																
S. NO.	COMPANY	GROSS REVENUE 2017-18	TOTAL ALF RECEIVED 2017-18	ALF as %age of GR	GROSS REVENUE 2018-19	TOTAL ALF RECEIVED 2018-19	ALF as %age of GR	GROSS REVENUE 2019-20	TOTAL ALF RECEIVED 2019-20	ALF as %age of GR	GROSS REVENUE 2020-21	TOTAL ALF RECEIVED 2020-21	ALF as %age of GR	GROSS REVENUE 2021-22	ALF Due 2021-22	ALF as %age of GR
1	Operator 1	585946117	30703284	5.24	629983285	30703284	4.87	431074077	30703284	7.12	199532143	30703284	15.39	247116596	30703284	12.42
2	Operator 2	54417283	30703284	<b>56.42</b>	73448063	30703284	<b>41.80</b>	53561740	30703284	<b>57.32</b>	11110887	30703284	<b>276.34</b>	9228035	30703284	<b>332.72</b>
3	Operator 3	723367743	33285518	4.60	568053545	28121048	4.95	500828576	30703285	6.13	201623649	30703284	15.23	244835538	30703284	12.54
4	Operator 4	339470230	30703284	9.04	415762353	30703286	7.38	297570797	30703284	10.32	148602380	29134248	19.61	136484546	30703284	22.50
5	Operator 5	97092553	30703284	31.62	112445207	30703286	27.31	81936600	30703284	<b>37.47</b>	27013517	30703284	<b>113.66</b>	50515435	30703284	<b>60.78</b>
6	Operator 6	830197284	33207889	4.00	815613551	32624542	4.00	701449553	30703283	4.38	368667165	30703284	8.33	439159515	30703284	6.99
7	Operator 7	266263000	30703284	11.53	191552619	30703284	16.03	156844379	30703284	19.58	51851377	30703284	<b>59.21</b>	85761760	30703284	<b>35.80</b>
8	Operator 8	592706241	30703284	5.18	545907435	30703284	5.62	478454327	30703284	6.42	227825971	30703284	13.48	266963427	30703284	11.50
9	Operator 9	86598000	30703284	35.45	125643000	30703284	24.44	81254000	30703284	<b>37.79</b>	18500000	30703284	<b>165.96</b>	14837000	30703284	<b>206.94</b>

Chennai: Highest Bid Phase II - Rs. 12,27,00,000 ; No Auction in Phase III																
S. NO.	COMPANY	GROSS REVENUE 2017-18	TOTAL ALF RECEIVED 2017-18	ALF as %age of GR	GROSS REVENUE 2018-19	TOTAL ALF RECEIVED 2018-19	ALF as %age of GR	GROSS REVENUE 2019-20	TOTAL ALF RECEIVED 2019-20	ALF as %age of GR	GROSS REVENUE 2020-21	TOTAL ALF RECEIVED 2020-21	ALF as %age of GR	GROSS REVENUE 2021-22	ALF Due 2021-22	ALF as %age of GR
1	Operator 1	347063086	14484145	4.17	273768752	13280904	4.85	250300392	12811651	5.12	103194020	13347088	12.93	135253713	13347087	9.87
2	Operator 2	62644000	13347088	21.31	253449000	13347091	5.27	285477000	13347087	4.68	51347000	13347087	25.99	64783000	13347087	20.60
3	Operator 3	205774827	13347087	6.49	243536102	13347087	5.48	249807228	13347087	5.34	186201621	13347087	7.17	222632600	13347087	6.00
4	Operator 4	183196339	13347087	7.29	203259230	13347087	6.57	128758996	13347086	10.37	60212199	13347087	22.17	86113800	13347087	15.50
5	Operator 5	22941965	13347088	<b>58.18</b>	24294000	13347088	<b>54.94</b>	24294000	3336772	13.73	24294000	13347087	<b>54.94</b>	Discontinued		
6	Operator 6	55758000	13347088	23.94	43728947	13347088	<b>30.52</b>	23441368	13347088	<b>56.94</b>	20270990	13347087	<b>65.84</b>	33480382	13347087	<b>39.87</b>
7	Operator 7	135923897	13347087	9.82	126781197	13347087	10.53	83492643	13347087	15.99	38466926	13347086	<b>34.70</b>	40548248	13347087	<b>32.92</b>
8	Operator 8	404463629	16178545	4.00	430038031	17201519	4.00	372863119	14914523	4.00	197417000	14914525	7.55	234661000	13347087	5.69

Bengaluru: RP (Highest Bid Phase II) - Rs. 21,60,00,000; Highest Bid Phase III (NOTEF) – Rs. 1,09,25,45,545																
S. NO.	COMPANY	GROSS REVENUE 2017-18	TOTAL ALF RECEIVED 2017-18	ALF as %age of GR	GROSS REVENUE 2018-19	TOTAL ALF RECEIVED 2018-19	ALF as %age of GR	GROSS REVENUE 2019-20	TOTAL ALF RECEIVED 2019-20	ALF as %age of GR	GROSS REVENUE 2020-21	TOTAL ALF RECEIVED 2020-21	ALF as %age of GR	GROSS REVENUE 2021-22	ALF Due 2021-22	ALF as %age of GR
1	Operator 1	258840522	27313640	10.55	259670717	27313640	10.52	206232390	27313640	13.24	75188921	27313640	36.33	108296362	27313639	25.22
2	Operator 2	179497544	27313640	15.22	211754342	27313640	12.90	161700948	27313640	16.89	50165713	27313640	<b>54.45</b>	53232896	27313639	<b>51.31</b>
3	Operator 3	288766217	27313640	9.46	339878723	27313644	8.04	264486791	27313639	10.33	92467970	27170106	29.38	120025404	27313639	22.76
4	Operator 4	185466000	27313640	14.73	185572000	27313640	14.72	119000000	27313639	22.95	48216000	22485230	<b>46.63</b>	48609000	27313639	<b>56.19</b>
5	Operator 5	242896159	27313636	11.24	271424023	27313640	10.06	221284777	27313640	12.34	120339000	27313643	22.70	137391000	27313639	19.88
6	Operator 6	350002848	27313639	7.80	372719436	27313639	7.33	289200856	27313638	9.44	132773023	27313639	20.57	168846721	27313639	16.18
7	Operator 7	140410000	27313640	19.45	167732730	27313640	16.28	96873871	27313640	28.20	37847956	27313639	<b>72.17</b>	65443906	27313639	<b>41.74</b>
8	Operator 8	277691182	27313639	9.84	281423130	27313639	9.71	228160588	27313639	11.97	97873202	27313638	27.91	116775095	27313639	23.39

**Kolkata: Highest Bid Phase II - Rs. 6,11,10,090 ; No Auction in Phase III**

S. NO.	COMPANY	GROSS REVENUE 2017-18	TOTAL ALF RECEIVED 2017-18	ALF as %age of GR	GROSS REVENUE 2018-19	TOTAL ALF RECEIVED 2018-19	ALF as %age of GR	GROSS REVENUE 2019-20	TOTAL ALF RECEIVED 2019-20	ALF as %age of GR	GROSS REVENUE 2020-21	TOTAL ALF RECEIVED 2020-21	ALF as %age of GR	GROSS REVENUE 2021-22	ALF Due 2021-22	ALF as %age of GR
1	Operator 1	146165000	5846566	4.00	94186000	5846575	6.21	104009448	2081243	2.00	84991000	4160374	4.90	86521000	3460840	4.00
2	Operator 2	260358751	10414349	4.00	288116611	11524665	4.00	232138260	9285530	4.00	128796048	9285531	7.21	134807295	5392292	4.00
3	Operator 3	422790943	17323001	4.10	345150182	16500274	4.78	288541114	10700376	3.71	152093076	9277282	6.10	172041334	6881653	4.00
4	Operator 4	158828939	6353160	4.00	180176766	7207075	4.00	138041800	5521672	4.00	73102589	7090708	9.70	68823430	2752937	4.00
5	Operator 5	64291000	2615018	4.07	68594837	2744072	4.00	39088729	1563549	4.00	38702101	1929971	4.99	39779139	1591166	4.00
6	Operator 6	219880448	8795218	4.00	251838907	10073556	4.00	172669983	6906799	4.00	109511754	4380471	4.00	101615224	4064609	4.00
7	Operator 7	43895000	1765023	4.02	66737000	2669492	4.00	36205000	1448200	4.00	26300000	1527758	5.81	29147000	1165880	4.00

**Ahmedabad: RP (Highest Bid Phase II) - Rs. 12,00,55,000 ; Highest Bid Phase III(NOTEF) – Rs. 42,68,76,267**

S. NO.	COMPANY	GROSS REVENUE 2017-18	TOTAL ALF RECEIVED 2017-18	ALF as %age of GR	GROSS REVENUE 2018-19	TOTAL ALF RECEIVED 2018-19	ALF as %age of GR	GROSS REVENUE 2019-20	TOTAL ALF RECEIVED 2019-20	ALF as %age of GR	GROSS REVENUE 2020-21	TOTAL ALF RECEIVED 2020-21	ALF as %age of GR	GROSS REVENUE 2021-22	ALF Due 2021-22	ALF as %age of GR
1	Operator 1	201051444	10671908	5.31	227724943	10671908	4.69	205609510	10671907	5.19	125108021	8003939	6.40	146069737	10671907	7.31
2	Operator 2	313943376	13721784	4.37	267764540	11393684	4.26	254013794	8865824	3.49	130948090	10633233	8.12	147940933	10671907	7.21
3	Operator 3	68439990	10671908	15.59	64552070	10671908	16.53	47069974	10671908	22.67	16192964	10671908	<b>65.90</b>	23583670	10671907	<b>45.25</b>
4	Operator 4	167432128	10671908	6.37	176516090	10671907	6.05	130081793	10671902	8.20	74582944	10671907	14.31	87475337	10671907	12.20
5	Operator 5	74601000	10671908	14.31	65322105	10671908	16.34	52672833	10671908	20.26	37193761	10671906	28.69	67645674	10671907	15.78
6	Operator 6	145795619	10671851	7.32	147930069	10671908	7.21	130093443	10671907	8.20	81339703	10671914	13.12	82314000	10671907	12.96

**Hyderabad: RP (Highest Bid Phase II) - Rs.18,00,00,000; Highest Bid Phase III (NOTEF) – Rs. 23,43,48,266**

S. NO.	COMPANY	GROSS REVENUE 2017-18	TOTAL ALF RECEIVED 2017-18	ALF as %age of GR	GROSS REVENUE 2018-19	TOTAL ALF RECEIVED 2018-19	ALF as %age of GR	GROSS REVENUE 2019-20	TOTAL ALF RECEIVED 2019-20	ALF as %age of GR	GROSS REVENUE 2020-21	TOTAL ALF RECEIVED 2020-21	ALF as %age of GR	GROSS REVENUE 2021-22	ALF Due 2021-22	ALF as %age of GR
1	Operator 1	285366035	12606438	4.42	295111097	10222844	3.46	241444413	12194246	5.05	103611708	7511109	7.25	157157908	6286316	4.00
2	Operator 2	115964741	4500000	3.88	93782198	4777179	5.09	70219348	4361410	6.21	32130440	4500000	14.01	48193184	4500000	9.34
3	Operator 3	6092262	4500000	<b>73.86</b>	13002188	4500000	<b>34.61</b>	10481273	4500000	<b>42.93</b>	3024788	4500000	<b>148.77</b>	9721987	4500000	<b>46.29</b>
4	Operator 4	19456341	4500000	23.13	107673453	4500000	4.18	72264322	4500000	6.23	29904405	4500000	15.05	56410980	4500000	7.98
5	Operator 5	219223337	8750700	3.99	227397040	9114101	4.01	188816192	9095883	4.82	98778000	6009413	6.08	135777000	5431080	4.00
6	Operator 6	Not Operational			25024584	4245557	16.97	39020522	5858704	15.01	29843000	5858709	19.63	36144000	5858707	16.21
7	Operator 7	172180874	6887235	4.00	186180063	7447203	4.00	122060069	4882402	4.00	54558787	4882403	8.95	89161610	4500000	5.05
8	Operator 8	166236523	6649461	4.00	154350427	6174017	4.00	118065634	4722625	4.00	48195279	4500000	9.34	74163475	4500000	6.07

<b>Pune: RP (Highest Bid Phase II) - Rs. 14,00,55,000; Highest Bid Phase III (NOTEF) – Rs. 42,03,50,268</b>																
S. NO.	COMPANY	GROSS REVENUE 2017-18	TOTAL ALF RECEIVED 2017-18	ALF as %age of GR	GROSS REVENUE 2018-19	TOTAL ALF RECEIVED 2018-19	ALF as %age of GR	GROSS REVENUE 2019-20	TOTAL ALF RECEIVED 2019-20	ALF as %age of GR	GROSS REVENUE 2020-21	TOTAL ALF RECEIVED 2020-21	ALF as %age of GR	GROSS REVENUE 2021-22	ALF Due 2021-22	ALF as %age of GR
1	Operator 1	315329445	17708245	5.62	263951989	7518110	2.85	234617767	8502981	3.62	99625908	10459433	10.50	127404648	10508757	8.25
2	Operator 2	44364213	10508756	23.69	54596288	10508756	19.25	50003285	10508756	21.02	16699286	10508756	<b>62.93</b>	17285914	10508757	<b>60.79</b>
3	Operator 3	227379211	10508757	4.62	243623196	10508757	4.31	222558796	10508758	4.72	80571699	10508757	13.04	109705434	10508757	9.58
4	Operator 4	127572000	10508756	8.24	123989711	10508756	8.48	112163660	10508755	9.37	45858806	10508757	22.92	107147478	10508757	9.81
5	Operator 5	52268914	10508757	20.11	83804230	10508757	12.54	82110463	10508757	12.80	33953248	10508756	30.95	42458697	10508757	24.75
6	Operator 6	206277704	10508687	5.09	197419979	10508756	5.32	172230153	10508756	6.10	84603740	10508756	12.42	112472000	10508757	9.34

<b>Jaipur: RP (Highest Bid Phase II) - Rs. 6,10,05,555; Highest Bid Phase III (NOTEF) – Rs. 28,34,98,387</b>																
S. NO.	COMPANY	GROSS REVENUE 2017-18	TOTAL ALF RECEIVED 2017-18	ALF as %age of GR	GROSS REVENUE 2018-19	TOTAL ALF RECEIVED 2018-19	ALF as %age of GR	GROSS REVENUE 2019-20	TOTAL ALF RECEIVED 2019-20	ALF as %age of GR	GROSS REVENUE 2020-21	TOTAL ALF RECEIVED 2020-21	ALF as %age of GR	GROSS REVENUE 2021-22	ALF Due 2021-22	ALF as %age of GR
1	Operator 1	157112365	7087460	4.51	168147558	7087460	4.22	160012999	7087460	4.43	93260279	5315595	5.70	136970175	7087460	5.17
2	Operator 2	77929656	7087460	9.09	72800481	7087460	9.74	72109100	7087460	9.83	41085666	7087460	17.25	50677853	7087460	13.99
3	Operator 3	16576750	7087460	<b>42.76</b>	15915222	7087460	<b>44.53</b>	11145670	7087460	<b>63.59</b>	11304323	7087460	<b>62.70</b>	15687597	7087460	<b>45.18</b>
4	Operator 4	92246191	7087460	7.68	94332761	7087460	7.51	69348357	7087457	10.22	48537286	7087460	14.60	56849286	7087460	12.47
5	Operator 5	121016328	7087460	5.86	106794090	7087460	6.64	62081846	7087460	11.42	29772351	7087460	23.81	48742554	7087460	14.54
6	Operator 6	72919963	7087346	9.72	67790338	7087460	10.45	52180994	7087460	13.58	34888550	7087460	20.31	44305000	7087460	16.00

<b>Lucknow: RP (Highest Bid Phase II) - Rs.14,00,55,000; Highest Bid Phase III (NOTEF) – Rs. 14,00,55,000</b>																
S. NO.	COMPANY	GROSS REVENUE 2017-18	TOTAL ALF RECEIVED 2017-18	ALF as %age of GR	GROSS REVENUE 2018-19	TOTAL ALF RECEIVED 2018-19	ALF as %age of GR	GROSS REVENUE 2019-20	TOTAL ALF RECEIVED 2019-20	ALF as %age of GR	GROSS REVENUE 2020-21	TOTAL ALF RECEIVED 2020-21	ALF as %age of GR	GROSS REVENUE 2021-22	ALF Due 2021-22	ALF as %age of GR
1	Operator 1	111888094	5396505	4.82	116139291	3554543	3.06	99561386	4815620	4.84	56387249	3319339	5.89	70966489	3501375	4.93
2	Operator 2	14639543	3501376	23.92	16320186	3501376	21.45	13663860	3501376	25.63	7127769	3501376	<b>49.12</b>	7294199	3501375	<b>48.00</b>
3	Operator 3	28292358	3501376	12.38	46781353	3501376	7.48	39898748	3501375	8.78	19313329	3501375	18.13	30578773	3501375	11.45
4	Operator 4	167935023	6717401	4.00	174455388	6978216	4.00	114379818	4575194	4.00	71702802	4575193	6.38	104394002	4175760	4.00
5	Operator 5	30364583	3501375	11.53	58313859	3501375	6.00	34972318	3501375	10.01	36349192	3501376	9.63	28440186	3501375	12.31
6	Operator 6	100934085	4037362	4.00	114528057	4581121	4.00	94768373	4581124	4.83	53752356	3000350	5.58	71364000	3501375	4.91

**Cochin: RP (Highest Bid Phase II) - Rs.10,11,69,990; Highest Bid Phase III(NOTEF) – Rs. 15,04,83,548**

S. NO.	COMPANY	GROSS REVENUE 2017-18	TOTAL ALF RECEIVED 2017-18	ALF as %age of GR	GROSS REVENUE 2018-19	TOTAL ALF RECEIVED 2018-19	ALF as %age of GR	GROSS REVENUE 2019-20	TOTAL ALF RECEIVED 2019-20	ALF as %age of GR	GROSS REVENUE 2020-21	TOTAL ALF RECEIVED 2020-21	ALF as %age of GR	GROSS REVENUE 2021-22	ALF Due 2021-22	ALF as %age of GR
1	Operator 1	46804669	3762088	8.04	55328777	3762088	6.80	51274132	3762088	7.34	27402558	3762088	13.73	31148480	3762089	12.08
2	Operator 2	99746734	3978064	3.99	110408648	4428151	4.01	124254159	4970169	4.00	78069000	4970167	6.37	71300000	3762089	5.28
3	Operator 3	160311298	6435624	4.01	152525173	6440532	4.22	133613958	6256730	4.68	73730913	5722784	7.76	75253947	3762089	5.00
4	Operator 4	112160950	4486438	4.00	97409365	4486438	4.61	96832676	4191408	4.33	52968000	3890609	7.35	59485000	3762089	6.32

**Coimbatore: RP (Highest Bid Phase II) - Rs. 6,73,00,000 ; No Auction in Phase III**

S. NO.	COMPANY	GROSS REVENUE 2017-18	TOTAL ALF RECEIVED 2017-18	ALF as %age of GR	GROSS REVENUE 2018-19	TOTAL ALF RECEIVED 2018-19	ALF as %age of GR	GROSS REVENUE 2019-20	TOTAL ALF RECEIVED 2019-20	ALF as %age of GR	GROSS REVENUE 2020-21	TOTAL ALF RECEIVED 2020-21	ALF as %age of GR	GROSS REVENUE 2021-22	ALF Due 2021-22	ALF as %age of GR
1	Operator 1	69837791	2934740	4.20	48817385	2652284	5.43	47138699	1111879	2.36	26702165	1818401	6.81	31250382	1250015	4.00
2	Operator 2	80072320	3202893	4.00	88913511	3556540	4.00	73929131	2957165	4.00	40053706	1602148	4.00	48461936	1938477	4.00
3	Operator 3	68795920	2751837	4.00	58548517	2341941	4.00	52028172	2081128	4.00	28530253	2081127	7.29	37726831	1509073	4.00
4	Operator 4	166125381	6645015	4.00	179322955	7172918	4.00	180005489	7200221	4.00	115693000	7200220	6.22	116581000	4663240	4.00

**Indore: RP (Highest Bid Phase II) - Rs. 5,21,20,890 ; No Auction in Phase III**

S. NO.	COMPANY	GROSS REVENUE 2017-18	TOTAL ALF RECEIVED 2017-18	ALF as %age of GR	GROSS REVENUE 2018-19	TOTAL ALF RECEIVED 2018-19	ALF as %age of GR	GROSS REVENUE 2019-20	TOTAL ALF RECEIVED 2019-20	ALF as %age of GR	GROSS REVENUE 2020-21	TOTAL ALF RECEIVED 2020-21	ALF as %age of GR	GROSS REVENUE 2021-22	ALF Due 2021-22	ALF as %age of GR
1	Operator 1	125652847	5026114	4.00	151671971	6066884	4.00	122299971	4891999	4.00	70541041	4186588	5.93	86273031	3450921	4.00
2	Operator 2	95895521	3778688	3.94	102559585	3892955	3.80	73964129	4368945	5.91	43794738	1814746	4.14	45542948	1821718	4.00
3	Operator 3	67965127	2718605	4.00	59406846	2376274	4.00	46767376	1870695	4.00	27364539	1094581	4.00	28672236	1146889	4.00
4	Operator 4	88285416	3531417	4.00	99071607	3962860	4.00	85789216	3962864	4.62	51853278	2900271	5.59	62294000	2491760	4.00

**Surat: RP (Highest Bid Phase II) - Rs.3,60,00,000; Highest Bid Phase III (NOTEF) – Rs. 3,60,00,000**

S. NO.	COMPANY	GROSS REVENUE 2017-18	TOTAL ALF RECEIVED 2017-18	ALF as %age of GR	GROSS REVENUE 2018-19	TOTAL ALF RECEIVED 2018-19	ALF as %age of GR	GROSS REVENUE 2019-20	TOTAL ALF RECEIVED 2019-20	ALF as %age of GR	GROSS REVENUE 2020-21	TOTAL ALF RECEIVED 2020-21	ALF as %age of GR	GROSS REVENUE 2021-22	ALF Due 2021-22	ALF as %age of GR
1	Operator 1	105638382	4225535	4.00	114307924	4572338	4.00	83147189	3325888	4.00	46685957	2859028	6.12	49779572	1991183	4.00
2	Operator 2	112006775	5902173	5.27	97142479	3058367	3.15	78262768	3291128	4.21	42755273	2375324	5.56	43427681	1737107	4.00
3	Operator 3	27311012	900000	3.30	20047064	1284880	6.41	13851939	707559	5.11	7555339	900000	11.91	9583642	900000	9.39
4	Operator 4	86200004	3448000	4.00	83809927	3352397	4.00	55006371	2200256	4.00	33595468	2200255	6.55	41632947	1665318	4.00
5	Operator 5	50221314	2008853	4.00	52168013	2086721	4.00	37446559	1497863	4.00	20247286	900000	4.45	20546592	900000	4.38
6	Operator 6	32388446	1284648	3.97	42317091	1692688	4.00	40988501	1692687	4.13	24971605	1586398	6.35	27024000	1080960	4.00

**Kanpur: RP (Highest Bid Phase II) - Rs. 8,00,55,000; Highest Bid Phase III(NOTEF) – Rs. 8,00,55,000**

S. NO.	COMPANY	GROSS REVENUE 2017-18	TOTAL ALF RECEIVED 2017-18	ALF as %age of GR	GROSS REVENUE 2018-19	TOTAL ALF RECEIVED 2018-19	ALF as %age of GR	GROSS REVENUE 2019-20	TOTAL ALF RECEIVED 2019-20	ALF as %age of GR	GROSS REVENUE 2020-21	TOTAL ALF RECEIVED 2020-21	ALF as %age of GR	GROSS REVENUE 2021-22	ALF Due 2021-22	ALF as %age of GR
1	Operator 1	85202303	3473261	4.08	77460202	3342925	4.32	63636855	2788723	4.38	39170120	1992541	5.09	51531722	2061269	4.00
2	Operator 2	12039279	2001376	16.62	15645955	2001376	12.79	11305060	2001376	17.70	5781229	2001376	<b>34.62</b>	7457697	2001375	26.84
3	Operator 3	18355824	2001376	10.90	29597172	2001377	6.76	22821388	2001375	8.77	12065512	2001376	16.59	16547512	2001375	12.09
4	Operator 4	31147395	2001375	6.43	53611430	2144457	4.00	34823231	2001375	5.75	19778175	2001375	10.12	29306210	2001375	6.83
5	Operator 5	78295690	3131828	4.00	82683575	3307343	4.00	49378709	2001375	4.05	33979011	2001376	5.89	33269378	2001375	6.02
6	Operator 6	84815221	3392610	4.00	84827044	3393082	4.00	71517539	3393081	4.74	39560692	2328321	5.89	51945000	2077800	4.00