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Problems and Prospects of Telecom Sector in India

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ABSTRACT: Telecommunication is one of the fastest growing industries in India that has undergone an innovative phase over the past few years and stands as the second largest telecommunications market in the world after China. It is due to of liberalization policy telecom sector could attract more FDI flows in private sector participation increased in total telephone connections of the nation. This led the sector to competitive stimulus high telecom penetration and substantial reduction in tariffs. Though foreign telecom players have been present in India for almost more than a decade with tremendous growth, the sector is yet to witness the expected vibrancy and infusion of innovative technologies. FDI in the telecom sector was initially allowed at 74%. It was subject to the condition that Companies bringing in FDI shall obtain necessary license from the Telecom Regulatory Authority of India (TRAI) for undertaking telecom activities. By recent decision government of India did hike FDI ceiling from 74% to 100% through the Foreign Investment Promotion Board (FIPB) and Government's consolidated FDI Policy.

KEYWORDS: Telecommunication, FDI, innovative ,technologies, liberalization and policy.

I.INTRODUCTION

India is currently the world's second-largest telecommunications market with a subscriber base of 1.20 billion and has registered strong growth in the past decade and a half. Contribution of mobile phone industry as a part of gross domestic product (GDP) of the country in 2014 has been to the tune of US\$ 400 billion. According to a report prepared by the Group Special Mobile Association (GSMA), as of January 2019, India has witnessed a 165% growth in app downloads in the past two years. Based on the data available from GSMA, this sector will create close to 4 million additional jobs by 2020. Tele-density of Indian telecom industry (wireless plus wire line) has grown from a low of 3.60% in March 2001 to 84% in March 2016. The sector is expected to contribute as much as 90% of the government's non-tax revenue. Digital India programme is also almost completely dependent on the telecom sector. The liberal and reformist policies of the Government of India have been instrumental along with strong consumer demand in the rapid growth in the Indian telecom sector. The deregulation of Foreign Direct Investment (FDI) norms has made the sector one of the fastest growing and a top five employment opportunity generator in the country.

Indian telecom sector is more than 165 years old. Telecommunications was first introduced in India in 1851 when the first operational land lines were laid by the government near Kolkata (then Calcutta), although telephone services were formally introduced in India much later in 1881. Further, in 1883, telephone services were merged with the postal system. In 1947, after India attained independence, all foreign telecommunication companies were nationalised to form the Posts, Telephone and Telegraph (PTT), a body that was governed by the Ministry of Communication. The Indian telecom sector was entirely under government ownership until 1984, when the private sector was allowed in telecommunication equipment manufacturing only. The government concretised its earlier efforts towards developing R&D in the sector by setting up an autonomous body – Centre for Development of Telematics (C-DOT) in 1984 to develop state-of-the-art telecommunication technology to meet the growing needs of the Indian telecommunication network. The actual evolution of the industry started after the Government separated the Department of Post and Telegraph in 1985 by setting up the Department of Posts and the Department of Telecommunications (DoT).

Indian telecom market as a market with great future Driven by unrelenting technological and market forces, telecommunications is one of the world's most dynamic economic sectors. Until not long ago a relatively obscure territory of interest mainly to engineers, telecommunications today seems to be everybody's proper playing field. Large and small businesses, user groups, investment banks, policymakers, development organizations, legislators, economists, political scientists, and lawyers, among others, are now actively and visibly involved in telecommunications. Hardly a day goes by without telecommunications events making news in the international and local press.



Although telecom is a young and dynamic industry with lot of growth opportunities, it is observed that the previously booming telecom markets in Europe and North America are on the way to saturation. As a result the telecom giants in these markets need to look for new markets in Asia, Africa and South America. The markets in Asia like India and China are quite attractive with tremendous growth potential. This has inspired numerous foreign telecom companies to enter the Indian and Chinese market in the recent past.

Telecommunication is one of the fastest growing industries in India that has undergone an innovative phase over the past few years and stands as the second largest telecommunications market in the world after China. It is due to of liberalization policy telecom sector could attract more FDI flows in private sector participation increased in total telephone connections of the nation. This led the sector to competitive stimulus high telecom penetration and substantial reduction in tariffs. Though foreign telecom players have been present in India for almost more than a decade with tremendous growth, the sector is yet to witness the expected vibrancy and infusion of innovative technologies. FDI in the telecom sector was initially allowed at 74%. It was subject to the condition that Companies bringing in FDI shall obtain necessary license from the Telecom Regulatory Authority of India (TRAI) for undertaking telecom activities. By recent decision government of India did hike FDI ceiling from 74% to 100% through the Foreign Investment Promotion Board (FIPB) and Government's consolidated FDI Policy.

II. REVIEW OF LITERATURE

Being a recent move, there have been various researches on different aspects of the initiative ranging from the economical to social and ethical dimensions. Some of these researches retrieved through internet searches have been reviewed here

Srivastava, R. Bhangle, Jatin & Somaiya, K.J. (2006) In their work on "Role of Competition in Growing Markets: Telecom Sector". This paper studies the booming service sector. The focus is on the cellular service providers in the country. As the topic suggests 'the role of competition in growing markets' an industry, which is in the growth stage, has been identified. The theory of product life cycle is explained with emphasis on the growth stage. It then studies the marketing strategies adopted by the major players like Bharati, Reliance, Orange, Tatas etc.. It also tries to show how in the product life cycle the various service providers are trying to fit in their products and services.

Sinha, S.K. & Wagh, Ajay (2008) In his work on The Indian telecom sector has emerged as the fastest growing telecom market in the world. With more affordable services, increased penetration and a supportive government along with regular fall in tariffs in the sector has brought significant changes in number of consumers and usage of cellular telecom services. However, with galloping achievements, there are few challenges too, to be overcome by the Indian telecom industry to ride high on the next growth wave.

Yadav et al. (2015) in his paper on rapid changes in technology in Indian telecom sector stated that there is a significant impact of technology on the operational aspect of telecom business with increased competition and emergence of rural market.

Fathima et al. (2013) in her article on FDI in Telecom Sector presented an overview of FDI in Indian Telecom sector. The article examined the current status of FDI in the Indian telecommunication sector and the issues being faced by foreign companies. The paper concludes with a brief economic examination through relevant factors influencing the level of FDI.

OBJECTIVES OF THE STUDY:

The main objectives of this paper is based on following headings:

- To analyze the problems and prospects of telecom sector in India.
- To examine the step taken by Govt. for development of telecom sector in India.

III. METHODOLOGY

The method used in this paper is descriptive-evaluative method. The study is mainly review based. It is purely supported by secondary source of data, i.e. books, journals, papers and articles and internet.



CHALLENGES OF TELECOM SECTOR IN INDIA:

- **High Right-of-Way (ROW) cost:** Sometimes, state governments charge a huge amount for permitting the laying of fiber, etc.
- **Lack of fixed line penetration:** India has very little penetration of fixed-line in its network whereas most of the developed countries have a very high penetration of fixed lines (telephone line that traveled through a metal wire or optical fiber as part of a nationwide telephone network).
- Only around 25% of Towers in India are connected with fibre networks, whereas in developed nations, it is in excess of 70%.
- 5G Network requires towers to be connected to with very high-speed systems. Those high speeds are not possible on the present radio systems.
- **Declining Average Revenue Per User (ARPU):** ARPU decline now is sharp and steady, which, combined with falling profits and in some cases serious losses, is prompting the Indian telecom industry to look at consolidation as the only way to boost revenues.
- Recently, the Supreme Court allowed the government's plea to recover adjusted gross revenue of about Rs 92,000 crore from telcos, that further adds to their stress.
- **Limited Spectrum Availability:** Available spectrum is less than 40% as compared to European nations and 50% as compared to China.
- **Low Broadband Penetration:** Low broadband penetration in the country is a matter of concern. As per white paper presented on broadband at the last International Telecommunication Union (ITU), broadband penetration in India is only 7%.
- Over the Top (OTT) applications such as WhatsApp, OLA and so on do not need permission or a pact with a telecommunications company. This hampers the revenue of telecommunication service providers.
- **Huge fluctuations in the duties on Telecom Equipment** which contribute to connecting the whole system from the central server to the consumer.
- **Timeframe of policy execution:** Government have withdrawn a lot of things to benefit telecom sector but by the time it gets executed to the market, it becomes too late.
- **Lack of Telecom Infrastructure in Semi-rural and Rural areas:** Service providers have to incur huge initial fixed cost to enter semi-rural and rural areas.
- **Pressure on Margins Due to Stiff Competition:** With competition heating up post entry of Reliance Jio, other telecom players are feeling the heat of substantial drop in tariff rates both for voice and data (more significant for data subscribers).

STEPS TAKEN BY THE GOVERNMENT:

- A new **National Digital Communications Policy - 2018 (NDCP-2018)** was unveiled in Oct 2018, to replace National Telecom Policy-2012, to cater to the modern needs of the digital communications sector of India. The policy aims to attract USD 100 billion worth of investments and generate 4 million jobs in the sector by 2022.
- Telecom Commission was re-designated as the "**Digital Communications Commission**".
- In 2017, Department of Telecom (DoT) came up with a gazette notification, advising the state governments to give quicker ROW permission and charge very little amount to service providers. Though, only some states responded.
- The government has provided benefits to telecom sector by withdrawing some duties.
- The government has fast-tracked reforms in the telecom sector and continues to be proactive in providing room for growth for telecom companies.
- The Department of Information Technology intends to set up over 1 million internet-enabled common service centres across India as per the National e-Governance Plan.
- FDI cap in the telecom sector has been increased to 100% from 74%. Out of 100%, 49% will be done through automatic route and the rest will be done through the FIPB approval route.
- FDI of up to 100% is permitted for infrastructure providers offering dark fibre, electronic mail and voice mail.
- The Government of India has introduced Digital India programme under which all the sectors such as healthcare, retail, etc. will be connected through the internet.
- Policy support from the government through an increase in the FDI cap to 100% from 74%, increasing expenditure on telecom infrastructure and services, and the launch of National Digital Communication Policy, 2018 has led to the growth of this sector.
- "Tarang Sanchar" launched by the DoT is a web portal that provides for information on mobile towers and EMF emission compliance.



- The nationwide Optical Cable (OFC) coverage doubled from 7 lakh km to 1.4 million km. The National Broadband Mission seeks to deploy optical fiber-based network spanning 50 lakh kilometres by 2024.
- The Department of Information Technology is going to establish over 1 million internet-enabled common service centres in accordance with the National e-Governance Plan.
- Digital India also played a role in the growth of this sector.

SUGGESTIONS:

It is evident that Telecom sector holds immense opportunities across entire India and below listed findings will help the industry take the speedy path towards growth: Penetration of rural markets (72% of population staying in rural areas) will be the key growth driver. National Telecommunication Policy 2012 proposes unified licensing, full MNP (Mobile number portability) and free roaming. Outsourcing non-core functions such as network maintenance, IT operations and customer service. Divestment of tower assets into separate companies will enable curb costs and focus on core operations. Introduce new and efficient technologies such as M2M and cloud computing. Benefits of industry status in line with other infrastructure sectors in the country to be implemented. Explore the option of revenue sharing agreement between Internet players and telecommunication companies. Rationalise taxes and levies in the sector. Reduction in license fees. Make more spectrum available for data usage. This can be achieved through enhancement in spectrum limit from 6.28MHz to 2x8MHz (paired spectrum), specific to GSM technology. This will be applicable to all areas excluding Delhi and Mumbai where it will be 2x10MHz (paired spectrum). Development of Telecommunication infrastructure.

- **NDCP-2018 advocates:-**
- Establishment of a **National Digital Grid** by creating a National Fibre Authority;
- Establishing **Common Service Ducts and utility corridors** in all new city and highway road projects;
- Creating a **collaborative institutional mechanism** between Centre, States and Local Bodies for Common Rights of Way, standardization of costs and timelines;
- **Removal of barriers to approvals;** and
- Facilitating development of **Open Access Next Generation Networks.**
- **Explore the option of revenue sharing agreement** between Internet players and telecommunication companies.
- **Outsourcing non-core functions** such as network maintenance, IT operations and customer service.
- **Divestment of tower assets** into separate companies will enable curb costs and focus on core operations.
- **Introduce new and efficient technologies** such as M2M (technology that enables networked devices to exchange information and perform actions without the manual assistance of humans) and cloud computing.
- **Benefits of industry status** in line with other infrastructure sectors in the country to be implemented.
- **Penetration of rural markets** (72% of population staying in rural areas) will be the key growth driver.
- The government should **increase the network area through optical fibre** instead of copper which is expensive. This is necessary to ensure last mile connectivity.
- The government needs to prepare a ground for **easy right-of-way permissions** and lower cost of right-of-ways.
- It is time to go for a **generational shift** to ensure that **current tariff is financially viable** for service providers.
- Telecom Operators should leverage on the talent pool in the country which is bringing in a lot of **new innovations in AI, block chain technology** etc.
- **New Infrastructure on shareable basis** just like the way telecom service providers share the cost of towers is need of the hour.
- The government should spend more on R&D and create an environment that makes India capable of manufacturing and exporting hardware components like mobile handsets, CCTV Cameras, touch screen monitors etc.

IV.CONCLUSION

Telecom sector is an essential service and not merely a revenue generator. It is estimated that for a given level of mobile penetration, a 10% substitution from 2G to 3G increased GDP per capita growth by 0.15 percentage points. Likewise, the doubling of data use leads to an increase in the GDP per capita growth rate of 0.5 percentage points. The recent reforms are a step in the right direction- especially with regards to the rationalization of AGR. The sector is looking at a potential boom in the coming decade. The telecom sector in India has to deal with various challenges like maintaining the sufficient spectrum, adoption of new technologies faster to be able to use the new features and techniques to serve the customers with better and feature rich service. A proactive and facilitatory government role regarding telecom sector is the need of the hour given the huge opportunities provided by the sector. Independent and



statutory body, **Telecom Regulatory Authority of India** (TRAI) has an important role to play as a watchdog of the sector. A more proactive and timely Dispute Resolution by **TDSAT** (Telecom Disputes Settlement and Appellate Tribunal) is the need of the hour.

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