

## Female Labour Force Participation Rate and Its Determinants in Post-Liberalization India

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### Abstract

The under participation of women in the labour force in the post-liberalisation period constitutes some of the most puzzling and debated paradoxes in development economics of India. Although India's economic growth, increasing education levels among women and declining fertility rate are strong indicators, there has been a steady and significant reduction in the participation of women in the labour market since the 1990s. In this paper the trends in FLFPR in the rural and urban sectors have been studied against the background of the National Sample Survey Organisation (NSSO) data and Periodic Labour Force Survey (PLFS) data between 1993-94 and the current period. It identifies and discusses factors that play crucial roles in shaping FLFPR such as education, household income, fertility, social norms, urbanisation and policy interventions by the government. Using a review-based framework of analysis with two theoretical concepts of the Goldin U-shaped curve and the income effect theorem, it concludes that explanation of the drop in FLFPR should not be limited to one phenomena but should be based on many factors, acting together. Policy recommendations for turning the tide and encouraging inclusive economic growth based on an increased women's participation in the Indian labour force industry are included at the end of the paper.

**Keywords:** Female Labour Force Participation Rate, post-liberalisation India, NSSO, PLFS, gender and labour economics, U-shaped hypothesis, women's empowerment.

The Indian economy that began to liberalize in 1991 saw a structural transformation; the Indian economy was a part of the world economy, its service sector grew, and its economy enjoyed unprecedented growth in GDP. However, surprising is the phenomenon of negative trends in the Female Labour Force Participation Rate (FLFPR) in the path of India's post-liberalisation period. Various theories suggest that development and empowerment of women should lead to greater female labour market involvement and in India the experience has been the exact opposite. Though economic theory, and international experience, point to the positive relation between development and labour market involvement of women, this has been the contrary in India. As per successive rounds of National Sample Survey Organisation (NSSO), in India, the FLFPR decreased from

around 42.7% in 1993–94 to 23.3% in 2017–18 (Ministry of Statistics and Programme Implementation [MoSPI], 2019). This reduction cannot be dismissed lightly—even if the measurements are adjusted to take into account the problems they introduce and correct, the drop remains quite large and worthy of serious scholarly research.

This phenomenon has garnered significant research and policy interest, and explanations have been offered by a wide range of approaches and opinions, many of which have been competing. Some believe that it is due to the higher income of families that lessens the economic pressure on women to work, the so-called income effect (Bhalla & Kaur, 2011). Others refer to the rising number of girls in school, thereby temporarily taking girls out of the labour force (Klasen & Pieters, 2015). Others highlight shifts in the economy,

the lack of women's participation in agriculture and in industry or services and imbedded male norms restricting women's mobility and job choices (Abraham, 2013; Mehrotra & Parida, 2017).

This more than just a purely academic question. One of the developing country's challenges is to get half of her population performing their productive potential which is a structural drag in terms of growth, equity and human development. The International Labour Organization (ILO) has frequently pointed out that the gender gap in the labour force participation rate would greatly contribute to GDP growth in emerging economies (Kapsos et al. 2014). For a country like India, where demographic dividend is the core of the country's future with its dream of 5 trillion economy, the demand of changing the status of FLFPR is not only a need for gender justice but also for the economy's development sustainability.

This paper sets out to present an analytical overview of the trends in FLFPR in the post-liberalisation India and systemically analyse the major determinants of FLFPR. The paper is structured as follows: Section 2 provides a literature review; Section 3 presents the theoretical framework; Section 4 summarizes the empirical trends; Section 5 provides detailed analysis of determinants; Section 6 examines the policy implications and Finally Section 7 concludes.

## Review of Literature

Since the domain of FLFPR in India is vast and interdisciplinary, it is getting extensive coverage from various streams of

literature like labour economics, gender studies, demography and sociology. Theoretical studies in this field laid the groundwork for the analysis of women's labor force participation and the empirical studies gradually have increased our understanding of the dynamic in India.

In terms of the role of women, Goldin (1995) put forth the controversial 'U-shaped hypothesis' which suggests that one should see a decrease, followed by an increase in the participation of women in the labour force as economies grow. Very early in development there is a high level of female involvement in the agricultural economy; increasing industrial development leads to a drop in the level of female participation due to social norms and increased employment in formal sectors; and later in the development phase there is another rise in the level of female participation when education levels rise and norms change. Mammen and Paxson (2000) generalised the framework and provide empirical evidence for various developing countries. However, the idea of this hypothesis does not hold true for India, where despite decades of uninterrupted growth, the anticipated flip hasn't occurred yet (Klasen & Pieters, 2015).

In an influential (though controversial) argument, Bhalla and Kaur (2011) suggested that this decline in the FLFPR in the mid-1990s to mid-2000s was driven primarily by the income effect, that is, families which experienced an increase in their income could afford to discourage women from working and consider non-participation a 'sign of prestige'. This explanation has been challenged for its

lack of an explanation for the reduced participation rates of urban women even in higher-income groups, particularly higher female income (Abraham, 2013).

The decline should be seen through the lens of structural transformation which excluded women: agricultural work has reduced, no alternative jobs for women in the manufacturing or services sector have been created. This is in accordance with Neff et al. (2012) who found that re-allocation to a different sector was insufficient to balance the reduction in sectoral employment for women, such that there would not have been any economic rebalancing for women.

Chatterjee et al. (2015) have argued, using NSSO data, that this reduction in the FLFPR was concentrated amongst the young female population aged 15–24, where it was because their school participation had increased; and that this effect would play itself back when they reached the labour market, with the added implication that they would be better educated to enter the market. Across social/classes, the preference of female participation in the domestic sphere was mentioned as a generic constraint limiting women's participation to the economic sphere by Rustagi (2010).

It is only in more recent research that the use of PLFS data has led to a re-evaluation of trends. The growth of agricultural self-employment was taken to be the reason for the recovery in FLFPR after 2017–18 documented by Mehrotra and Parida (2017) especially in rural areas. However, Lahoti and Swaminathan (2016) provided a more differentiated picture by breaking down

FLFPR by levels of education and concluded that a major reason behind the decline in FLFPR is because women with intermediate qualifications—enough to do more than manual work, but not enough for formal jobs—are the ones that are facing their decline.

Thus, the evidence from the literature shows that FLFPR in the Indian context is a complex phenomenon that is influenced by not just one but by multiple causes, including the interplay of income effects, transition to and from education, structural economic changes, social norms and policy environments. This paper builds on and synthesises this body of work.

### Theoretical Framework

Theoretical consideration of FLFPR is based on some mutually linked frameworks. The neoclassical labor supply theory suggests that workers' choices of entering the workforce or remaining in or getting out of domestic work are made based on the wage rate on the labour markets relative to the labor market "reservation wage," the lowest acceptable wage to workers for domestic work. Women's reservation wage tends to be higher as there is an opportunity cost associated with their unpaid domestic and care work (Borooah, 2010). An increase in the reservation wage, which corresponds to an increase in household income, leads to a lower tendency among women to undertake paid work. This constitutes the income effect.

Complementary, when the wages women earn in the market increase, they have increased opportunity costs of remaining at home, which would encourage participation.

The influence on FLFPR could change (be positive or negative) depending on the magnitude of these two forces compared to each other. The magnitude of the substitution effect in India has been limited because of the wage discrimination and occupational segregation and the income effect has been stronger especially for the urban middle class women (Kingdon, 2017).

These microlevel views can be combined together into a macrolevel developmental pattern as put forth by Goldin (1995): the U-shaped hypothesis. It helps in explaining India's transition from the developed to the developing economy especially for the case of transition theory. This U-shape relationship however is heavily crucially dependent on the extent of structural transformation, and how it specifically takes places, especially when in the past manufacturing has been one of the most important sectors to absorb large groups of women around the world, therefore, the rise of the U may never happen, or the countries may find themselves stuck at the end of the U (Klasen and Pieters, 2015).

An even more comprehensive account of FLFPR comes from a gendered political economy, which suggests that it is not simply the outcome of economic calculations reflecting the individual but it is shaped by social institutions – family, caste, religion and the state – that determine the type, nature and opportunity for paid work according to gender (Rustagi, 2010). This way of thinking is crucial to understand the disconnect between India's aggregate growth in the economy and increased women's economic engagement.

## Trends in FLFPR in Post-Liberalisation India

Long-term downward trend in subsequent NSSO and PLFS surveys gives a clear picture of diminishing trend first followed by a partial recovery in the recent past. According to the NSSO Employment and Unemployment Surveys (EUS), the FLFPR (usual principal and subsidiary status, all ages) fell from 42.7% in 1993–94 to 35.6% in 2004–05 and further to 25.3% in 2011–12, before reaching a low of 23.3% in 2017–18 (MoSPI, 2019). The recovery from this situation was reflected in the Annual PLFS reports with recovery rate at 30.0% in 2022–23, which was primarily due to the increased participation of female workforce in the rural sector in agriculture and allied activities.

Most significantly, there are geographic, sector, and social group variations in the trend. Rural FLFPR has been and always will be higher than urban FLFPR as there is more agricultural self-employment in the countryside. Rural FLFPR, however, experienced even more serious declines, dropping from >49% in 1993–94 to <25% by 2017–18, which then rose towards >35% by 2022–23 (MoSPI, 2023). The rate of urban FLFPR remained low over the past several years at between 14% and 20%, underscoring the obstacles women face entry into formal employment in urban areas.

The sectoral breakup of FLFPR shows that agriculture, which had historically borne the lion's share in the employment of women has been the worst affected. Along with the reduction in farm employment that followed the mechanisation process and partly because

of other factors, women lost jobs without being taken up in non-agricultural fields. This is despite manufacturing, where employment could be expected to increase in parallel. In contrast to the service industry that has led India's growth since liberalisation, it has been a relatively environment inhospitable to women at lower levels of education formal qualifications, which many women are lacking (Abraham, 2013).

The split by educational background indicates an increase in women's participation rate at the low education end, and a relatively high participation rate on the higher end of the educational spectrum, implying a pattern that aligns with the findings of Lahoti and Swaminathan (2016) on the economically forced high participation rate of those with no education or primary education and relatively high participation rates for those with graduate or post-graduate degrees thanks to professional employment. But female secondary school graduates, the largest and rapidly increasing group, display both the lowest levels of participation, and the most limited opportunities in the formal service sector, between the brake on agricultural jobs and a lack of opportunities.

### **Determinants of FLFPR in Post-Liberalisation India Education**

The relation between Education and FLFPR relationship is complex and non-linear relationship in India. Although higher education tends to boost women's participation in the labour market through enhanced human capital and widening of

occupational opportunities, the move from primary to secondary education seems to have an immediate negative impact on women's labour market activity. Chatterjee et al. (2015) observed that women's enrolment in school educates has played a major role in the FLFPR going down from 2004 to 2012. This 'education withdrawal effect' indicates that the positive impacts of the increasing education literacy of women may only come out in the longer-term as the current education literate women enter the labour market.

But education must be matched with opportunities for employment in order for it to alter working practices. The mismatch between education and employment is increasing with the increase in women's education in general, and in less good matching with suitable employment in semi-urban and rural areas in particular, leaving education to raise aspirations not participation (Klasen & Pieters, 2015). More educated women are also limited in their choices by social norms around the acceptability of certain work.

### **Household Income and the Income Effect**

According to the income effect, an increase in household income will shorten the need for women to be in the labor market. Using NSSO data, Bhalla and Kaur (2011) have shown that the rise in average consumption expenditure of the house have had a positive relationship with the fall in FLFPR, mainly in rural areas during the 1990s to 2000s. Men's income may increase enough to make the withdrawal of women's labour market participation more than a choice; in many

Indian communities the choice of being a housewife is related to middle class respectability.

The income effect explains but not all of the downward movement. Abraham (2013) demonstrated that FLFPR had fallen even in families where male incomes were not significantly increased and that structural changes in the labour market must be considered, in addition to changes in household wealth. Moreover, the income effect model can mask the agency of women, by attributing the failure to participate to a woman's freely made decision not to participate, as opposed to a result of limited options.

### **Urbanisation and Structural Transformation**

Interestingly, India's high urbanisation rate has been seen to be pinned with low FLFPR. This is due to the fact that urban labour markets are more well-structured with a greater value attached to education, formal qualifications and other capabilities which many women may lack. Also, the social norms in urban areas may be more restrictive for women, in particular in upwardly mobile communities with regards to women's mobility and employment. Owning cars or using other private transport options provides women with an alternative way to get to work in cities, which is an option that the public system does not offer, thereby reducing women's participation in the labour market in cities (Neff et al., 2012).

Structural transformation has also played a decisive role. The government's focus

over the last 20 years has been on reducing the size of agriculture as a share of GDP and employment while failing to develop manufacturing in the region. Services, which are capital and skill-driven, have been the driver of India's growth and this type of services has not been very keen on accommodating low-educated women workers. This is referred as 'premature deindustrialisation' which is one of the important structural barriers for FLFPR (Mehrotra & Parida 2017).

### **Fertility and Reproductive Health**

Low fertility rates and the responsibility for childcare are well-known factors largely responsible for women's underrepresentation in the labour force around the world. The TFR is down from about 3.4 in 1993 to 2.0 in 2019–21 in India, implying that women have been liberated for participating in the labour force through a change in circumstances. The time burden of caring, however, has not decreased from women due to the lack of institutionalized facilities such as crèches, 'anganwadis' with extra hours, paid maternity leave for the informal sector.

The time which women spent on unpaid domestic work is far greater than men in all states and across all socioeconomic groups in the country according to the National Family Health Survey (NFHS-5) data (MoHFW, 2021). Women's capacity to work is limited because of this time-poverty especially if participation in paid work is limited in the formal sector where working hours are inflexible.

## Social and Cultural Norms

There are more subtle and far more profound norms affecting people's actions than there are to measure; perhaps none more so than the social and cultural norms themselves. Survey by Rustagi (2010) report how women in North Indian states experience structural barriers in accessing the labour market due to patriarchal norms which have limitations in terms of space and occupation for them. Many communities enforce the concept of 'izzat' (honour / respectability) which restricts castes and classes in some communities in posing to participate in labor any castes or classes other than domestic, and literally creates a 'social divide' between the female labor market.

Gender restrictions exacerbate the effects of occupational segregation based on caste. There are more upper-caste women that face social norms against labour, as opposed to lower caste women doing this economically. Furthermore, there was a significant inter-caste difference in FLFPR as discovered by Borooah (2010), thus revealing the nature of interactions between gender and caste in the Indian context of economic roles of women.

Domestic and communal violence against women, as well as violence in public places, is also a barrier to FLFPR. The fear of harassment limits women's job mobility and flexibility by making them less able to take work or travel to workplaces which are distant from home and to work late night hours, effectively decreasing their job options and bargaining power in the labour market (Kapsos et al., 2014).

## Government Policies and Schemes

Participation in FLFPR is influenced by policies that have direct, positive or negative effects on participation in the project. Since the introduction of Mahatma Gandhi NREGA (MGNREGA) in 2005, it has become one of the most important policy measures on women's participation in the economy. MGNREGA has increased women's participation in paid work, especially in less developed states, by improving their access to work and ensuring 100 days of wage employment to rural households, with 33% of development ensuring women's participation. The study has revealed that the overall participation in the MGNREGA has led to an increase in the income, bargaining power in household and also access to banks account among women (Kingdon, 2017).

Betibachao Betipadhao, Mahila Shakti Kendra, Pradhan Mantri Matru Vandana Yojana (PMMVY) and the PM Mudra Yojana for women entrepreneurs are more recent policy initiatives. However, they have lacked effectiveness in impacting FLFPR due to poor implementation, low awareness and failure to consider structural issues like the lack of childcare infrastructure and safety concerns.

Low FLFPR is recognised as a problem faced at the national levels in several strategy documents drafted by the Niti Aayog and the National Policy for Women 2016. In fact, the Economic Survey of India (2018) dedicated a whole chapter on the topic, attributing it to a hindrance in realising India's demographic dividend. But achieving the policy recognition in action demand on-the-

ground institutional investment and cultural shift, which doesn't yet exist en masse.

### Policy Implications

A combination of inter-acting policy measures to overcome all three structural, social and institutional hurdles is important to address the low and declining FLFPR in India. The analysis results in several priority areas.

Firstly, essential is the increased capacity of the childcare facilities. The affordable, accessible and quality childcare centres near workplaces and residential areas would have the effect of a lot of the child care burden shifting from the shoulders of women. There is a need to significantly expand the National Creche Scheme and to incentivise the private sector to increase childcare facilities in the workplace, through the Maternity Benefit (Amendment) Act, 2017.

Secondly, the development of skills needs to be designed for women and correspond to their demand in the labour market. Gender responsive aspects such as flexible time, good, safe provisions for commute, and placement support for women need to be integrated into the Pradhan Mantri Kaushal Vikas Yojana and other such schemes. Consideration particularly needs to be given to women with secondary education, as they have the largest participation disadvantage.

Third, safety of women both in public and their workplace should be improved in order to raise FLFPR. The Sexual Harassment of Women at Workplace (Prevention, Prohibition and Redressal) Act, 2013 needs to be strengthened, especially amongst the

women engaged in informal sector, where the majority work. Women's access to their work opportunities is also significantly determined by their access to safe and inexpensive public transportation.

Fourth, community outreach, involvement and engagement of men in gender equality efforts and media tools can assist in changing the cultural expectations about women's economic participation over time. Local-level Panchayati Raj institutions, especially in states with a high proportion of female panchayat members, have the potential to influence the Institution to change norms locally.

### Conclusion

In the post-liberalisation India, the trend of decreasing Female Labour Force Participation Rate (FLFP) is a paradox of development. Even as the economic growth and literacy for women as well as leveling up of health parameters, India has seen the overall participation of women in the labour market has declined consistently over the past 30 years. This paper found that such a drop had multiple causes, ranging from the income effect operating on family labour supply choices, to the short-term departure of young women from the labour force for higher education; economic structural change and the lack of job opportunities for women; deeply entrenched social and cultural attitudes; and the widespread lack of child care and job security measures.

The recent upturn in FLFPR following 2019 in PLFS data – triggered by rural women's greater involvement in agriculture and allied

activities, provides a hopeful and positive but guarded prospect to a potential longer-term structural shift. Some of the key obstacles to women's full participation in the economy are still firmly in place in India.

To materialize a substantial and sustainable contribution to the FLFPR, something more than policy interventions is necessary: a foundational restructuring of the social contract on the position of women in the economy and society. The shift must come as a result of investments in education, care, safety and skill-building and further efforts to change attitudes and social norms that restrict women's economic identity to their domestic roles. The potential of India's demographic dividend and inclusive economic growth can only be realised by bringing everyone, and especially women, into the mainstream of employment market.

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