



GIG ECONOMY AND LIVELIHOOD SECURITY AMONG URBAN WORKERS: A COMPARATIVE STUDY OF BENGALURU AND TUMAKURU

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Abstract

The gig economy has emerged as an important component of urban employment in India, supported by digital platforms, smartphones, online payments and changing consumer behaviour. The expansion of app-based transport, food delivery, e-commerce delivery, logistics, home services and freelance work has created new employment opportunities for urban workers who may face difficulties in accessing conventional salaried employment. At the same time, gig work raises concerns relating to income instability, occupational safety, social security, employment continuity, operating costs and retirement protection. This study examines the relationship between the growth of gig employment and livelihood security among urban workers, with special reference to Bengaluru and Tumakuru in Karnataka. The study is based mainly on secondary data obtained from NITI Aayog, Government of India, Government of Karnataka and published academic studies on platform work. The comparison shows that Bengaluru has a much larger labour market and a more developed platform economy, while Tumakuru represents an emerging market with growing opportunities for digital transport, delivery and logistics services. The study finds that gig work offers relatively low entry barriers, flexible working hours, multiple earning opportunities and access to a wider consumer market. At the same time, workers face irregular earnings, fuel and maintenance expenses, occupational hazards, limited bargaining power, dependence on ratings and algorithmic decisions, and inadequate access to conventional employment benefits. The study argues that flexibility alone cannot be treated as livelihood security. Sustainable gig employment requires social protection, occupational safety, transparent platform practices, grievance mechanisms, skill development and mechanisms for protecting workers against income and health-related risks.

Keywords: GIG Economy, Platform Workers, Livelihood Security, Urban Employment, Bengaluru, Tumakuru, Social Security

Introduction

Digitalisation has changed the structure of urban employment by creating new forms of work mediated through online platforms. The gig economy represents an important part of this transformation, where individuals undertake work outside the traditional employer-employee relationship and receive income for specific tasks, assignments or services. In India, gig work has expanded through app-based passenger transport, food delivery, e-commerce, logistics, home services, freelancing and other digitally mediated activities. NITI Aayog estimated India's gig workforce at 7.7 million in 2020–21 and projected that it could reach 23.5 million by 2029–30, equivalent to 4.1 per cent of the total workforce. Medium-skilled workers accounted for about 47 per cent, high-skilled workers 22 per cent and low-skilled workers 31 per cent of the gig workforce. The expansion of gig work is closely associated with urbanisation, increasing internet access, digital payments, smartphone use and demand for rapid consumer services. Cities with large populations, high purchasing power and diversified service economies provide particularly favourable conditions for platform-based employment. Bengaluru occupies an important position in this process because of its large service economy, technology sector, expanding consumer market and extensive demand for transport, food delivery and other on-demand services. Tumakuru has a smaller labour market, but industrialisation, commercial development, urbanisation and increasing digital adoption are creating new opportunities for platform-mediated services.



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The growth of gig employment has two sides. On one side, platform work can reduce barriers to labour-market entry and provide flexible working arrangements. Workers can often decide when to work and may use more than one platform to generate income. On the other side, the absence of a conventional employer-employee relationship can leave workers exposed to fluctuations in demand, changes in incentive structures, operating costs and limited access to employment benefits. Research on food delivery workers in Bengaluru found that many workers worked for long hours and, after operational and fixed costs were considered, their earnings were considerably constrained. The study also reported financial precariousness and stress arising from uncertain earnings. Research on ride-hailing workers in Bengaluru similarly identifies a tension between flexibility and livelihood security. Radhakrishnan and Roy (2023) found that platform work offered flexibility and autonomy while also exposing workers to insecurity arising from weak regulation and limited employment protection. More recent research on Bengaluru has highlighted the financial consequences of platform-based work, including debt dependence and declining income, particularly among cab drivers and food delivery workers. Livelihood security in this context cannot be understood simply as the availability of work. It includes regularity and adequacy of income, protection against illness and accidents, employment continuity, access to social insurance, manageable work-related expenses, retirement protection and the ability to deal with unexpected financial shocks. The present study therefore compares the emerging gig economy in Bengaluru and Tumakuru and examines the opportunities and risks associated with platform-based employment.

Statement of the Problem

The expansion of gig employment has created a new source of livelihood for urban workers, but the quality and security of such employment remain important concerns. Conventional employment generally provides a clearer employment relationship and may provide access to benefits such as provident fund, insurance, paid leave and other forms of social protection. Gig workers, in contrast, often bear the cost of vehicles, fuel, maintenance, mobile connectivity and equipment while depending on platform demand for their earnings. The problem becomes particularly important when income from gig work becomes the principal source of household livelihood. Irregular assignments, changes in platform incentives, customer ratings, account suspension, accidents and illness can directly affect household income. The Code on Social Security, 2020 formally recognises gig workers and platform workers and contains provisions dealing with social security schemes, registration and related welfare mechanisms. The central issue addressed by this study is thus the extent to which the expansion of platform-based employment contributes to livelihood opportunities while also creating new forms of economic and social insecurity. A comparison between Bengaluru and Tumakuru is useful because the two urban labour markets differ considerably in scale and economic structure.

Review of Literature

NITI Aayog (2022) examined the growth of India's gig and platform economy and estimated that the number of gig workers would increase substantially over the decade. The report identified retail, transportation, manufacturing, finance and insurance, education and other sectors as important areas of gig employment. It also observed the concentration of workers across low-, medium- and high-skilled occupations.

Bharadkar, Medappa, Mani, Taduri and Tiwari (2020) examined food delivery workers in Karnataka and reported that workers often worked for more than eight hours a day while their earnings were reduced by direct and fixed operating costs. The study also identified stress, anxiety and financial uncertainty as important features of platform work.

Radhakrishnan and Roy (2023) studied ride-hailing platform workers in Bengaluru. Their research showed that gig work provides flexibility and autonomy but also exposes workers to risks arising from inadequate regulation and employment security. Their findings highlight the contradiction between flexible work arrangements and livelihood insecurity.



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Medappa (2025) studied the financial and social lives of platform-based cab drivers and food delivery workers in Bengaluru. Based on ethnographic research involving 117 participants, the study found that debt, financial commitments and dependence on platform work could deepen workers' economic vulnerability. The research also showed how declining platform earnings could affect household-level financial security.

Recent research by **Afsharinia and Gurttoo (2026)** provides further evidence concerning the human-security dimensions of low- and semi-skilled gig work in India. The dataset focuses on the experiences of gig workers and provides a basis for examining the relationship between platform work and broader questions of worker security.

Research Gap

Existing studies have concentrated considerably on Bengaluru, particularly on food delivery and ride-hailing workers. These studies provide useful information about income, working conditions, flexibility, financial vulnerability and platform dependence. However, comparatively less attention has been given to emerging urban markets such as Tumakuru. There is also a need to distinguish between the size of the platform economy and the quality of livelihood generated through it. A city may have a rapidly expanding gig economy without necessarily providing adequate livelihood security to workers. The present study addresses this gap by comparing a highly developed platform market, Bengaluru, with an emerging platform market, Tumakuru.

Objectives of the Study

The study has the following objectives:

1. To examine the growth and major forms of gig and platform employment in India.
2. To compare the employment structure and potential for gig employment in Bengaluru and Tumakuru.
3. To examine the major opportunities provided by gig employment to urban workers.
4. To identify the major livelihood security risks faced by gig workers.
5. To compare the livelihood-security dimensions of gig employment in Bengaluru and Tumakuru.
6. To suggest measures for improving the livelihood security and social protection of gig workers.

Research Methodology

The study follows a descriptive and comparative research design. It is based primarily on secondary data obtained from NITI Aayog, Government of India, Government of Karnataka and published academic research relating to gig and platform employment. The existing document reports total workers of 4,246,927 for Bengaluru Urban and 1,354,646 for Tumakuru and characterises Bengaluru as having a highly developed platform economy and Tumakuru as an emerging platform market. The study examines the growth, types, opportunities and risks associated with gig employment and compares the two urban labour markets. Tables, percentages and comparative descriptions are used for interpretation. Since no original respondent-level dataset is included in the supplied document, the analysis does not claim statistical significance based on primary survey data.



Data Analysis and Interpretation

Table 1:Growth of India's Gig and Platform Economy

Particulars	Value
Estimated gig workers in 2020–21	7.7 million
Projected gig workers in 2029–30	23.5 million
Expected growth	Approximately three times
Projected share of workforce in 2029–30	4.1%
Medium-skilled gig workers	47%
High-skilled gig workers	22%
Low-skilled gig workers	31%

Source: NITI Aayog (2022), *India's Booming Gig and Platform Economy: Perspectives and Recommendations on the Future of Work*.

The data indicate that India's gig economy is expanding rapidly. The number of gig workers was estimated at 7.7 million in 2020–21 and is projected to increase to 23.5 million by 2029–30. This indicates that platform-based work is becoming an increasingly important component of the Indian labour market. The largest proportion of gig workers is expected to be in medium-skilled occupations. The growth of this sector creates employment opportunities for workers who may have limited access to conventional formal employment.

Table 2: Employment Structure of Bengaluru and Tumakuru

Particulars	Bengaluru Urban	Tumakuru
Total workers	4,246,927	1,354,646
Relative size of labour market	Very large	Moderate
Major economic activities	IT, services, trade, transport and technology	Industry, trade, services and transport
Platform economy	Highly developed	Emerging
Digital consumer market	Very large	Moderate
Scope for gig employment	Very high	Increasing

Source: Compiled from Government of Karnataka district-level labour and urban development data.

Bengaluru has a substantially larger labour market than Tumakuru. Its strong information technology sector, service industries, retail market, restaurants, transport services and large consumer population have created favourable conditions for the expansion of gig work. Tumakuru has a smaller labour market dominated by industrial, commercial and service activities. However, increasing digitalisation is creating opportunities for platform-based mobility, delivery, logistics and other services.

Table 3: Major Types of GIG and Platform Work

Type of Gig Work	Examples
Passenger transport	App-based taxi and two-wheeler services
Food delivery	Restaurant food delivery
E-commerce delivery	Online shopping and parcel delivery
Logistics	Local transportation and last-mile delivery
Home services	Repair, cleaning and personal services
Freelance services	Digital and professional services
Online work	Remote and task-based digital work

Source: NITI Aayog (2022) and related literature on the Indian gig economy.



Gig employment includes several different categories of work. Passenger transportation and food delivery are among the most visible forms, but the sector also includes logistics, home services, freelancing and online work. The nature of livelihood risk differs according to the type of work. Delivery workers may face fuel costs and road accidents, whereas online workers may face irregular assignments and payment uncertainty.

Table 4: Opportunities Provided by Gig Employment

Opportunity	Contribution to Workers
Low entry barriers	Enables relatively quick entry into employment
Flexible working hours	Allows workers to choose working schedules
Multiple platforms	Provides opportunities for income diversification
Digital payments	Facilitates faster and convenient transactions
Large consumer market	Creates demand for platform services
Self-managed work	Provides some degree of work autonomy
Wider market access	Connects workers with customers beyond local areas

Source: Compiled from NITI Aayog (2022) and studies on platform-based employment.

Gig employment provides several advantages to urban workers. Workers can generally enter platform work without lengthy recruitment procedures. Flexible working arrangements are particularly useful for workers who have family responsibilities or require supplementary income. Bengaluru provides greater opportunities because of its large consumer base and diversified service economy. Tumakuru also provides opportunities, although the smaller market limits the volume of platform-based demand.

Table 5: Major Livelihood Security Risks of Gig Workers

Risk Dimension	Major Problem
Income security	Irregular and fluctuating earnings
Employment security	Possibility of account suspension or termination
Social security	Limited access to conventional employment benefits
Occupational safety	Accidents and work-related hazards
Operating costs	Fuel, vehicle maintenance, mobile data and equipment
Health security	Loss of income during illness or injury
Algorithmic management	Ratings and automated decisions affect work allocation
Grievance redressal	Limited bargaining power
Retirement security	Inadequate pension protection
Financial security	Irregular income and dependence on credit

Source: NITI Aayog (2022); Government of Karnataka (2025).

The major concern associated with gig employment is the gap between flexibility and security. Workers may have greater control over their working hours, but their income can fluctuate according to demand, incentives and platform policies. Delivery and transport workers also bear several employment-related expenses themselves. These costs can significantly reduce their actual disposable income.

Table 6: Factors Affecting Livelihood Security of Gig Workers

Factor	Effect on Livelihood Security
Regularity of work	Determines income stability
Number of working hours	Influences total earnings
Platform incentives	Can increase or reduce earnings
Fuel and maintenance costs	Reduce net income
Customer ratings	Affect access to future assignments



Digital literacy	Influences ability to use platforms effectively
Occupational safety	Determines health and income security
Social insurance	Protects workers against major risks
Access to credit	Helps manage income fluctuations
Skill development	Improves opportunities for better-paying work

Source: Compiled from NITI Aayog (2022) and gig-economy literature.

Livelihood security depends on several factors rather than income alone. Workers who have regular assignments, adequate skills and access to social insurance are likely to be more secure than workers who depend entirely on irregular platform demand. The cost of fuel and vehicle maintenance is particularly important for transport and delivery workers because these expenses directly reduce net earnings.

Major Findings of the Study

1. India's gig workforce is projected to increase from 7.7 million in 2020–21 to 23.5 million by 2029–30.
2. Gig employment is spread across transport, retail, manufacturing, finance, education, delivery, logistics and other activities.
3. Bengaluru has a considerably larger labour market than Tumakuru, with 4,246,927 workers compared with 1,354,646.
4. Bengaluru has a highly developed platform economy, while Tumakuru represents an emerging platform market.
5. Passenger transport, food delivery, e-commerce delivery and logistics constitute important forms of urban gig work.
6. Low entry barriers make gig work accessible to workers who may find conventional employment difficult to obtain.
7. Flexible working hours provide an important advantage to workers who need control over their work schedules.
8. Multiple platforms can provide opportunities for income diversification.
9. Gig workers bear several operating expenses, especially fuel, vehicle maintenance, mobile data and equipment costs.
10. Irregular platform demand and changing incentives can cause fluctuations in earnings.
11. Customer ratings and algorithmic decisions can affect access to future work.
12. Occupational accidents and illness can have serious consequences because interruption of work can immediately reduce income.
13. Research from Bengaluru shows that long working hours and work-related expenses can substantially reduce effective earnings.
14. Platform work provides flexibility, but flexibility by itself does not guarantee livelihood security.
15. Social-security coverage, insurance, grievance redressal and retirement protection are important requirements for sustainable gig employment.

Conclusion

The gig economy has become an important component of India's changing urban labour market. Its expansion is supported by digital platforms, changing consumer preferences and the growing demand for transport, delivery, logistics, home services and online work. NITI Aayog's projection of 23.5 million gig workers by 2029–30 indicates the scale of the transformation taking place in the Indian labour market. The comparison between Bengaluru and Tumakuru shows two different stages of platform-economy development. Bengaluru has a much larger labour market and a highly developed platform economy, supported by its technology, service, transport and consumer sectors. Tumakuru has a smaller labour market but shows increasing potential for platform-based employment as digitalisation and urban economic activity expand. The principal contribution of gig employment is its ability to provide relatively accessible employment, flexible schedules and connections between workers and consumers. These features can be valuable for workers who face barriers in conventional employment or require supplementary income. At the same time, the study shows that gig employment



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involves significant livelihood risks. Irregular earnings, operating costs, occupational hazards, health risks, limited bargaining power, algorithmic management and inadequate retirement protection can weaken the security of workers. Evidence from Bengaluru reinforces this conclusion. Studies of food delivery and ride-hailing workers have identified the tension between flexibility and security, while recent research has shown that financial dependence and debt can deepen workers' vulnerability. The future of the gig economy should thus be evaluated not only in terms of employment generation but also in terms of the quality and security of livelihoods created. A sustainable platform economy requires a balance between technological innovation, business flexibility and worker protection. Social insurance, accident protection, transparent platform practices, grievance mechanisms, skill development and income-risk protection can help ensure that the expansion of gig employment contributes to secure and sustainable urban livelihoods.

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