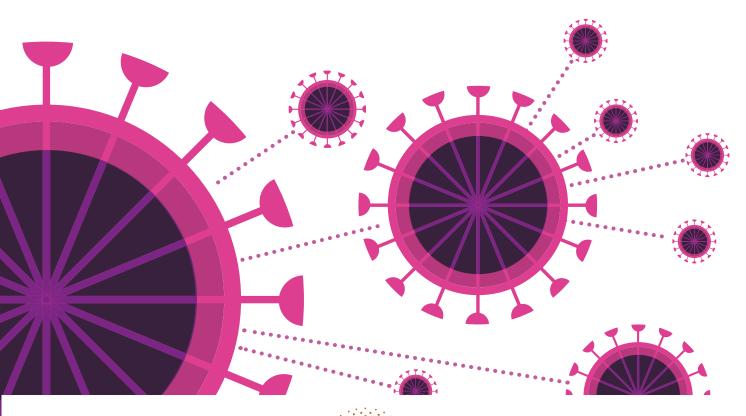A series of background briefings on the policy issues arising from the Covid-19 pandemic

City of dreams no more: The impact of Covid-19 on urban workers in India

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A CEP Covid-19 analysis

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CENTRE for ECONOMIC PERFORMANCE

City of Dreams no More: The Impact of Covid-19 on Urban Workers in India

CEP COVID-19 ANALYSIS

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Summary

- Many developing economies have large informal sectors and growing urban youth populations, who lack basic social protections at work. The CEP surveyed 8,500 workers aged 18 to 40 in urban India to understand their experiences at work during Covid-19. The survey was conducted between May and July 2020.

- As in many countries, unemployment increased dramatically. 15.5 percent of workers lost their jobs and 21.7 percent worked zero hours during the survey months.

- Unlike many developed and some developing economies, 52 percent of urban workers went without work or pay and received no financial assistance to tide over the crisis.

- On average, earnings fell by 48 percent in April and May, compared to pre-Covid months of January and February. Financial assistance from the government or employers was available to less than a quarter of the workforce.

- Covid-19 exacerbated pre-existing labour income inequality – those in the top quartile of pre-Covid income saw their share in total income increase by 16 percentage points within three months.

- Several states in India are debating an urban job guarantee to address the crisis. 70 percent of urban workers have no guarantee of a minimum number of days of work in the year. Of them, 70 percent would like to have a guarantee of 100 days of work, primarily to overcome the livelihood insecurity from Covid-19.

- A national policy commitment is needed to prevent the current earning losses from pushing many of these workers into urban poverty and the threat of long-term unemployment.

Introduction

Urbanisation is closely intertwined with economic development. Cities provide opportunities for increased growth and incomes, and most countries have achieved sustained economic development together with rapid urbanisation (Henderson, 2010). Covid-19 has put urban areas at the "frontlines of the pandemic" and the livelihood crisis arising from it.

Many developed countries have responded with income and job support programmes to protect workers and support a recovery. The scale of the problem and more limited state capacity have constrained policy responses in developing economies. Concerns are therefore being raised over the sustainability of cities and their resilience in dealing with disease and economic distress (Khan, 2020).

Developing economies across the world have large informal sectors, where workers lack even basic social protections like sick pay. The necessary responses to the pandemic have heightened the risks of immediate income shortfalls and long-term unemployment for these individuals. Young workers, who are over-represented in informal employment, are particularly at risk of job losses, which can have life-long scarring impacts on their future prospects, mental health and community well-being.

India typifies concerns over urban labour markets in developing economies. It has a large informal workforce. Regular wage/salaried employees make up less than half of the urban workforce (48 percent in 2018), and the rest are in a hinterland of casual work, temporary contracts and self-employment.[1] Even among regular employees, only 27 percent have a written employment contract while a little over half have access to some benefits (provident funds, sick pay, health insurance) through the government or their employer. The latter make up the flagship schemes for Covid-19 relief to workers in urban areas which, at the outset, provides limited reach due to large proportions of uncovered workers. Many workers are expected to be covered by these schemes. Yet old and new forms of informality persist, leaving many without basic social protections. This report shows that Covid-19 has decimated livelihoods in urban India and created a new underclass of workers who are being pushed into poverty.

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[1] In the PLFS, regular wage/salaried employees are defined as "persons who worked in others farm or nonfarm enterprises (both household and non-household) and, in return, received salary or wages on a regular basis (i.e. not on the basis of daily or periodic renewal of work contract)".

The pandemic has ravaged urban labour markets in many developing economies (International Labour Organisation, 2020). But granular and systematic evidence to understand the economic impacts of the pandemic and to inform recovery policies has been difficult due to a lack of detailed labour market data. There is a dearth of evidence on actual impacts across different workers. Even less well understood are the work impacts on young and informally employed individuals, especially in low-income urban areas, who are most at risk of the scarring effects of long-term unemployment. Like many developing economies, India has a young workforce, 62 percent are aged under 40 years and most of them are in informal employment. To understand the different impacts of the pandemic, the Centre for Economic Performance (CEP) conducted a survey of more than 8,500 workers in urban India aged 18 to 40 during May-July 2020.

India recorded its first case of coronavirus in late January 2020. Since then, the number of confirmed cases has increased rapidly and as of 25 August it stands at 3.17 million with 58,390 deaths (Ministry of Health & Family Welfare, 2020). The Government of India announced a nation-wide lockdown aimed at slowing down the spread of Covid-19 on 24 March 2020. The lives of 1.3 billion people came to a standstill for 21 days. Businesses, factories, schools and transport were closed and almost everyone was asked to stay at home. The lockdown was one of the most restrictive in the world (Hale et al., 2020), and it was extended three times afterwards until 31 May.

While the initial phase of the lockdown applied everywhere, a more targeted approach was taken later so that some level of normal activity could resume. Most urban centers, especially big cities such as Delhi, Mumbai, Pune, and Kolkata, were classified as red zones during most of the lockdown. This had a large and immediate impact on employment. Millions of workers in urban centers saw their work come to a halt abruptly and many workers who had migrated to these areas were stranded without any source of income.

Labour force participation rates in urban areas were already low (48 percent) and average daily wages were modest to begin with -- Rs 590,[2] or roughly GBP 6 a day. This briefing shows that the pandemic has had a dramatic impact on livelihoods in urban areas. 21.7 percent were unemployed or reported zero hours of work during May-July. Many had already not been working since the start of the lockdown and had received zero pay in April (which is the first

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[2] The average daily wage in 2018 in 2020 Rs, adjusted for inflation using CPI-IW (Base 2001=100), source: Labour Bureau.

full month of the lockdown) without any financial assistance. Counting them in, 52 percent of urban workers went without work or pay during the lockdown.

Financial assistance from employers or the government was available to less than a quartile of individuals. In the absence of job protections and government support, worklessness translated into huge reductions in incomes. On average, income fell by 48 per cent after the lockdown in April-May, compared to pre-Covid labour income in January-February.

Covid-19 exacerbated pre-existing inequities in urban India and those at the lower end of incomes suffered the most. Workers in the bottom half of pre-Covid labour income had bigger income losses than the top half. Informal workers, especially young informal workers from lower socioeconomic groups, faced the biggest job cuts. As a result, those in the top quartile of pre-Covid income went on from getting a 64 percent share of total income to a much higher 84 percent within three months. Policy made just a small dent in undoing this steep rise in labour income inequality, taking the share of the top quartile slightly lower to 80 percent or 16 percent higher than before.

Growing urbanisation and an even faster-growing young workforce had already been posing massive challenges for the Indian labour market. The pandemic has intensified the difficulties and these are expected to get even bigger as the urban demography changes over the next couple of decades. Among urban workers, the youngest (aged 18 to 25 years) were already much less likely to be in work, more likely to be employed informally and more likely to be paid less.[3] The pandemic has left the "lockdown generation" with lower employment rates and a legacy of entrenched inequality.

National and state governments recognize the livelihood crisis, but for the most part, their recovery packages fall far short of outlays to overcome it. Although India runs the world's largest jobs programme (which guarantees 100 days of work to households), it is limited to rural residents. In urban areas, the survey shows that 31 percent of individuals have a guaranteed number of days of work. Among those who do not, an overwhelming 70 percent reported needing a guarantee of a minimum 100 days of work. The youngest workers were

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[3] In 2018, labour force participation rate was 37 percent for 18 to 25 year olds, compared to older cohorts (56 percent), and they earned less (Rs 372) than the older cohorts (Rs 605). They are also much more likely to be employed informally, 84 percent have no written contract (compared to 70 percent of older cohorts) and 62 percent have no benefits (compared to 44 percent of older cohorts). On-the-job training is limited, with just 9 percent having received some form of vocational training in 2017-2018.

much more likely to want a job guarantee, primarily for the livelihood security that they provide in these hard times.

A few states in India are introducing state-level job guarantees for their urban residents (Nahata, 2020), but workers in large parts of the country would fall outside the purview of these state programmes. A national level commitment to overcome the livelihood crisis is therefore essential for preventing urban workers from falling into poverty and for countervailing the sharp and sudden rise in inequality.

About the Survey

Sample design

The LSE-CEP Survey of Work Arrangements is part of a larger research programme on job preferences and work arrangements at CEP, designed to understand informality and self-employment. The survey builds on previous surveys on Alternative Work Arrangements in various countries including India, Italy, the United Kingdom and the United States (Boeri et al., 2020). It contains questions on demographics and work arrangements, including temporary work, casual labour, self-employment and gig work, which often are not covered in detail in national labour force surveys.

The current survey in India was conducted between 14 May and 8 July 2020, with the aim of understanding the impact of Covid-19 on employment, earnings and work choices, especially among workers who are informally employed. India was selected for its large informal workforce, young population and restrictive lockdown (see Appendix for timeline of lockdown). The survey was designed specifically to understand the experiences of younger individuals, who are over-represented in informal jobs and are most at risk of the scarring effects of long-term unemployment under a weak recovery from the pandemic.

The survey was conducted on a sample of 8,530 individuals who are between 18 and 40 years of age. As labour force participation rates for this group in urban areas is around 52 percent, individuals, who were working at the time of the survey or had been in work at some point during the past 10 years, were surveyed. Women in this group tend to have even lower labour force participation rates (22 percent). Therefore, female respondents were over-sampled to enable an understanding of work experiences based on various demographic characteristics.

The survey sample was drawn randomly from a panel of individuals available from a professional survey company and from field visits to selected low-income urban ward clusters. The professional survey company aggregates and maintains national panels of individuals for

corporate and academic market research. The panels are constructed by the company in ways similar to recent online surveys like Boeri et al. (2020), Adams-Prassl et al. (2020) and Blundell and Machin (2020). Field visits were conducted in 50 urban wards to ensure that pandemic-induced concerns over sample selection in online surveys are reduced.[4] The field visits collected details of resident households from local markets and businesses (providing essential goods and services). Face-to-face interviews were not feasible due to lockdown restrictions. A random sample of 30 individuals per ward were therefore interviewed by phone.

Sample characteristics

Table 1 reports key demographic and employment characteristics of our survey sample. Weighted estimates are reported in the briefing to account for the sampling design. Weights are constructed by age, gender, and education categories from the latest national Periodic Labour Force Survey (PLFS) microdata.[5]

Key features of the Indian labour market are a large share of individuals with less than 10 years of formal education, low female labour force participation rates, large shares of workers from historically marginalised social groups (Scheduled Castes, Scheduled Tribes and Other Backward Classes), high shares of informality in the workforce (defined as the lack of a written employment contract[6]) and relatively small shares of regular salaried workers.

Table 1: Characteristics of Workers

Education	
10th Standard or less	55.9
12th Standard	11.6
Diploma	3.2
Graduate	20.8
Postgraduate	8.4
Female	21.6
Mean age (years)	30.0
Social Group	

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[4] One concern is non-response which increased in the CMIE employment sample this year. The survey company informed us that they have not experienced a drop in response rates since the pandemic and this is reflected in our survey being executed very quickly on their panel. Another concern was potentially low response rates from low-income areas and female members (especially higher education women) who might have experienced increased burden of household tasks. This motivated the sampling quota and field visits.

[5] Unweighted estimates yield similar findings, as the CEP survey sample is broadly representative in key demographics and employment characteristics to the national workforce (Appendix, Table A1).

[6] In the PLFS, information on employment contracts is only available for salaried/wage employment.

General Category	29.9
Scheduled Caste	28.4
Scheduled Tribe	11.2
Other Backward Classes	30.6
Religion	
Hinduism	84.0
Islam	12.9
Other	3.1
Pre-Covid Monthly Earnings (in Rs)	
Average earning of Bottom Quartile	3015
Average earning of Quartile 2	7332
Average earning of Quartile 3	12525
Average earning of Top Quartile	40457
Has/Had written employment contract	17.7
Type of employment last week (if employed)	
Casual workers	32.7
Self-employed workers	32.3
Salaried workers	19.5
Unemployed	15.5
N	8530

Sources: LSE-CEP Survey of Work Arrangements 2020; Periodic Labour Force Survey 2017-2018. Observations are weighted using PLFS according to age, gender, and education. Values reported are percentages unless stated otherwise.

Having discussed key features of the urban labour market in India, the next section presents main findings for workers experiences since the pandemic. Definitions for variables presented in the findings are in Box A1 of the Appendix.

Overall Picture

1. A majority of urban workers went with no pay or assistance during the lockdown

Unemployment increased sharply during the lockdown months. Table 2 shows only 1.2 percent of our sample was unemployed before the lockdown, but this number increased to 15.5 percent being unemployed in the week before they were surveyed. 90 percent of those becoming unemployed state coronavirus and the lockdown as one of the reasons they lost their job. The vast majority of them (92 percent) also report having become unemployed within less than 3

months. The pandemic therefore caused job losses among individuals who had been in work before the crisis.

The already high unemployment rate hides more worklessness. There was a sharp rise in zero hours among those who reported being employed. Counting those who worked for zero hours (in the week before the survey) as unemployed, the effective unemployment rate rises substantially from 15.5 to 21.7 percent during the survey months of May to July.[7] On average, hours worked in the week (before the survey) fell to 37 hours, much lower than the usual number of 56 hours a couple of years ago. This is consistent with findings from the UK, which saw stable employment rates but sharp increases in zero-hour employees (Bell, Codreanu, and Machin, 2020).

These unemployment rates reflect what happened since May when the survey began. Respondents were also asked questions about their ability to work and get paid over longer durations during the lockdown. 69 percent of all individuals reported not being able to work for 30 days or more during the lockdown (which started in the last week of March). April is the only full month of India's strict national lockdown. Most individuals were unable to work during the month and received no pay. The share of those who received zero pay rose from 2 percent in January and February, to 9 percent in March and 60 percent in April when the strict national lockdown was in place.

Those who went without pay or any form of financial assistance in the full lockdown month were effectively unemployed in April, and continued to be more likely to have zero pay in May or zero hours afterwards.[8] Counting them in Table 2 shows that the effective unemployment rate soars to 52 percent. This number summarises the cumulative impact of the lockdown, whereby April saw many earning nothing and subsequent months saw some recovery but with persistently high rates of unemployment and zero hours (Appendix Table A5).

As a result of this worklessness during the lockdown, cumulative earning losses in April and May were staggering. Compared with pre-Covid labour incomes from January and February,

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[7] The unemployment rates reported here are based on weekly recall, which is standard in national labour force surveys in India. The CMIE Private Limited surveys show urban unemployment rates of about 25.5 percent based on daily recall. Estimates from the CEP survey are similar – 27.5 percent - under daily recall.

[8] Workers with zero pay in April and no financial assistance were more likely to be on zero hours afterwards, 10 percent compared to 3.5 percent for others. The former were also more likely to report zero pay in May, 83 percent compared to 49 percent for others (among respondents for who May earnings are available).

incomes fell by 47 percent over April and May, on average. Financial assistance from the government or employers made a tiny dent in undoing these large earning losses.[9]

The Government of India introduced various relief measures to help those being impacted by the pandemic and the lockdown. Only 20.6 percent of the sample received financial assistance from the government, that amounted to 24 percent of their monthly salary.[10] 9.6 percent received financial assistance from their employer, amounting to an average 57 percent of their monthly salary. Table 2 shows that, overall, only 23 percent of the respondents received some form of financial assistance during the lockdown. Among those who received assistance, the amount was worth 44 percent of their monthly wages on average.

The experience of workers in India, therefore, differs from those of many countries, which have put in place furloughing schemes and other forms of assistance, which to varying degrees have also been made available to self-employed workers like in the United Kingdom. A majority of urban workers in India, in contrast, have gone without pay or assistance during the lockdown.

2. The top quartile have a 16 percentage point higher share of total income since the lockdown

Workers in lower-income groups in usual times were more likely to be unemployed than those in higher income groups and experienced a larger decrease in earnings. Table 2 shows that the decrease in earnings was particularly large for workers in the bottom three income quartiles, compared to those in the top income quartile (where quartiles are in terms of pre-Covid labour incomes from January and February). Covid-19 led to a massive drop in earnings for most workers, which is consistent with estimates from various surveys done in collaboration with non-governmental organisations that were conducting relief operations for workers (Centre for Sustainable Employment, 2020). In particular, the latter find a 64 percent drop in earnings for their sample of workers (who are less likely to be from the top quartile). It is however in stark contrast to many countries that have put in place relief transfers to prevent large pay cuts for workers.

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[9] Hereafter, unemployment statistics are based on the entire sample, while other statistics excludes those who have been unemployed for more than 3 months.
[10] Defined as their daily wage multiplied by 30

Table 2: Unemployment, Earning Losses and Financial Assistance by Pre-Covid Earning Quartiles

		Pre-Covid Earnings Quartiles			
	All	Bottom Quartile	2nd Quartile	3rd Quartile	Top Quartile
Unemployment					
Pre-Covid Unemployment (%)	1.2	3.2	0.6	0.7	0.7
Unemployment last week (%)	15.5	20.7	18.6	17.1	5.0
Unemployment last week + zero hours worked (%)	21.7	28.1	26.5	23.4	7.7
Unemployment last week + zero hours worked + zero pay received with no financial assistance (%)	52.0	51.7	67.6	61.3	22.0
N	8530	2119	2264	1951	2097
Earning Losses					
Pre-Covid Mean Monthly Earnings (Rs'000)	15.1	3.1	7.3	12.5	40.5
Mean Earning Losses All (%)	47.9	68.0	85.3	74.1	29.3
Financial Assistance from Government or Employer Those Received (%)	23.4	32.0	20.2	18.4	25.1
If Received, Mean Assistance as % of monthly wage[11]	43.9	43.9	20.2	34.4	74.8
N	8407	2046	2247	1934	2081

Source: LSE-CEP Survey of Work Arrangements 2020.
Income quartiles are constructed using average earnings in January and February 2020. Pre-Covid unemployment is the share of those unemployed for more than 3 months before the survey. Unemployment last week is an indicator for whether the individual was unemployed the week before the survey. Unemployment last week and zero hours worked is an indicator for whether the individual was unemployed the week before the survey or that hours of work were zero. Unemployment last week and zero hours worked and zero pay received with no financial assistance is an indicator for whether the individual was unemployed the week before the survey or that hours of work were zero or the pay in April was zero, and they did not get any financial assistance. Pre-Covid earnings are average earnings in January and February 2020. Earning losses are 1 - (Average earnings in January and February / Average earnings in April and May). Financial assistance is an indicator for whether the individual received any financial assistance from their employer or the government. Financial assistance received as a percentage of monthly earnings is the amount of financial assistance received from the government or the employer as a share of the monthly wage estimated by multiplying daily wage by 30.

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[11] We use monthly wage since that information is available for the whole sample including the unemployed, based on their previous employment.

Workers in the bottom and top income quartiles were more likely to receive assistance than the middle groups. But assistance was not enough to prevent inequality from becoming more deeply entrenched. Figure 1 shows inequality, measured as the share of income of the top quartile out of total earnings of everyone. Prior to the pandemic, individuals in the top quartile received a 64 percent share of total income. This share increased to 84 percent within three months. Financial help from employers and the government did not compensate for the loss of the bottom quartiles, and the share of the top quartile remains high at 80 percent. The top quartile's share of total income increased sharply by 16 percentage points during the lockdown months.
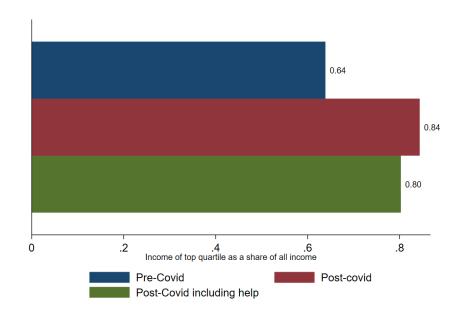

Figure 1: Share of the top quartile (in terms of pre-Covid labour incomes) in total income

Variation Across Work and Worker Types

1 Variation across Work Types

Informal workers were much more likely to be unemployed than formal workers, across all definitions of unemployment. Table 3 shows that informal workers saw unemployment rates which were 13 to 48 percentage points higher than those for formal workers. In the absence of social protections, these workers also suffered much greater earning losses and received limited financial assistance. While individuals in the bottom quartile were more likely to be effectively unemployed, the misery of this group was largely driven by those who were informally employed.

One reason for their greater suffering was that informal workers were less able to work under social distancing measures that were put in place to contain the pandemic. Of those who were unable to work for 30 days or more, 95 percent were employed informally. 19.2 percent of formal workers were not able to work for 30 days or more. This number is much higher for informal workers, almost 80 percent of whom were out of work for more than a month.

One respite from lockdown restrictions was having the ability to work from home. Here again informal workers were at a disadvantage. While around 89 percent of formal workers could continue working from home in some capacity, only 11 percent of informal workers could do so. The ability to work from home was more prevalent in industries that offer more regular job contracts, such as information and communication, finance and insurance, and professional and scientific activities.

Table 3: Unemployment, Earning Losses and Financial Assistance by Work Types

	All	Informal	Formal	Informal Bottom Quartile
Unemployment				
Pre-Covid Unemployment (%)	1.2	1.1	1.8	3.2*
Unemployment last week (%)	15.5	17.9	4.5	23.7
Unemployment last week + zero hours worked (%)	21.7	25.4	4.7	32.5
Unemployment last week + zero hours worked + zero pay received with no financial assistance (%)	52.0	60.6	11.8	60.1
N	8530	6511	2019	1576
Earning Losses				
Pre-Covid Mean Monthly Earnings (Rs'000)	15.1	12.1	29.5	3.3
Mean Earning Losses All (%)	47.9	63.3	17.3	76.6
Financial Assistance from Government or Employer				
Those Received (%)	23.4	18.4	46.9	23.9
If Received, Mean Assistance as % of monthly wage	43.9	27.2	74.7	33.6
N	8407	6424	1983	1517

Source: LSE-CEP Survey of Work Arrangements 2020.
Income quartiles are constructed using average earnings in January and February 2020. Pre-Covid unemployment is the share of those unemployed for more than 3

months before the survey. Unemployment last week is a dummy for whether the individual was unemployed the week before the survey. Unemployment last week and zero hours worked is a dummy for whether the individual was unemployed the week before the survey or that hours of work were zero. Unemployment last week and zero hours worked and zero pay received with no financial assistance is a dummy for whether the individual was unemployed the week before the survey or that hours of work were zero or the pay in April was zero, and they did not get any financial assistance. Pre-Covid earnings are average earnings in January and February 2020. Earning losses is 1 - (Average earnings in January and February / Average earnings in April and May). Financial assistance is a dummy for whether the individual received any financial assistance from their employer or the government. Financial assistance received as a percentage of the monthly earnings is the amount of the financial assistance received from the government or the employer as a share of the monthly wage estimated by multiplying daily wage by 30. Formal is a dummy for whether the individual has a written employment contract, informal is a dummy for whether the individual does not have a written employment contract. Informal bottom quartile is a dummy for whether the individual does not have a written employment contract and belongs to the bottom quartile according to their average income in January and February

Informal workers were not only unable to work, at their workplace or from home, they also lacked access to job protections, which resulted in much higher proportions of days not paid. Figure 2a shows 79 percent of informal workers could not work for 30 days or more compared to 19.2 percent of formal workers. Formal workers were also more likely to get paid. Figure 2b shows 79 percent of informal workers did not get paid for 30 days or more compared to 14.4 percent of formal workers. Similarly, salaried workers had fewer days when they were not paid even when they missed work compared to casual and self-employed who ended up with more days of unpaid missed work (Appendix, Figure A1).
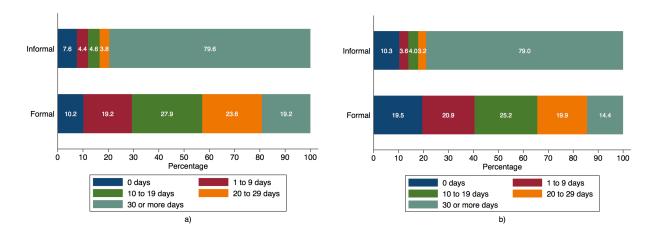
Figure 2: Number of days a) unable to work and b) not paid, by formality

The pandemic has revealed the fragility of informal labour markets in urban India. Table 3 and Figure 3 show that less than a fifth of informal workers received financial assistance compared to around half of formal workers. Formal workers received more assistance as a share of their income, 74.7 percent compared to informal workers who received just 27 percent on average (Table 3).
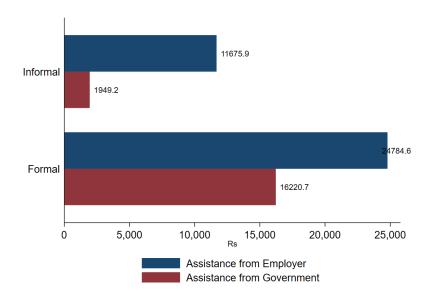
Figure 3: Amount of assistance received by formality

2 Variation across Worker Types

Previous research finds that young, low-educated, and low-income workers have been hit the worst by the pandemic (Adams-Prassl et al., 2020; Bell, Codreanu, and Machin, 2020). Table 4 examines outcomes across age groups. Employment losses were higher for younger workers (18 to 25 years old) than older workers (26 to 40 years old), which raises concerns over potential scarring effects for the lockdown generation. Low-income workers in the informal sector and especially young low-income workers in informal employment were hard hit by job losses. The pandemic therefore heightened pre-existing inequalities by placing a disproportionate burden of job and earning losses on already marginalized groups of informal, young and low-income workers. Just like for low-income groups, pre-existing inequalities were also intensified for low-education and historically marginalized social groups, who are over-represented in informal work. These additional results are reported in Appendix, Tables A2 and A3.[12]

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[12] Conditional on participation in the labour force, women do slightly less badly than men in terms of employment outcomes, which is driven by higher-education women and selection into jobs where work can be done more easily from home.

Table 4: Unemployment, Earning Losses and Financial Assistance by Worker Types

	All	Young	Older	Informal Young Bottom Quartile
Unemployment				
Pre-Covid Unemployment (%)	1.2	1.9	0.9	3.8
Unemployment last week (%)	15.5	16.9	15.0	25.2
Unemployment last week + zero hours (%)	21.7	25.1	20.3	35.5
Unemployment last week + zero hours + zero pay received with no financial assistance (%)	52.0	54.2	51.1	64.1
N	8530	3116	5414	637
Earning Losses				
Pre-Covid Mean Monthly Earnings (Rs '000)	15.1	12.2	16.4	3.2
Mean Earning Losses All (%)	47.9	54.3	45.9	70.0
Financial Assistance from Government or Employer				
Those Received (%)	23.4	23.4	23.4	20.5
If Received, Mean Assistance as % of monthly wage	43.9	44.5	43.6	39.6
N	8407	3056	5351	610

Source: LSE-CEP Survey of Work Arrangements 2020. Income quartiles are constructed using average earnings in January and February 2020. Pre-Covid unemployment is the share of those unemployed for more than 3 months before the survey. Unemployment last week is an indicator for whether the individual was unemployed the week before the survey. Unemployment last week and zero hours worked is an indicator for whether the individual was unemployed the week before the survey or that hours of work were zero. Unemployment last week and zero hours worked and zero pay received with no financial assistance is an indicator for whether the individual was unemployed the week before the survey or that hours of work were zero or the pay in April was zero, and they did not get any financial assistance. Pre-Covid earnings are average earnings in January and February 2020. Earning losses is 1 - (Average earnings in January and February / Average earnings in April and May). Financial assistance is an indicator for whether the individual received any financial assistance from their employer or the government. Financial assistance received as a percentage of monthly earnings is the amount of financial assistance received from the government or the employer as a share of the monthly wage estimated by multiplying daily wage by 30. Young workers are individuals between 18 and 25 years old. Older workers are individuals between 26 and 40 years old. Informal young low-earning is an indicator for whether the individual does not have an employment contract, is 18 to 25 years old, and falls on the bottom quartile according to their average earnings in January and February.

Social Assistance and Policy

The pandemic has revealed the limits of India's welfare systems, particularly in urban areas, which typically are not covered under many poverty alleviation programmes designed for rural development and where workers fall through the cracks of formal benefit schemes. The Indian government's Covid-19 recovery package increased the budgetary allocation for some government schemes to provide relief to informal workers. But exclusions and omissions in delivery and the size and composition of the contributions have prevented widespread relief and recovery (Dhingra and Ghatak, 2020).

The survey collected information on a number of benefits: Provident fund, Pension, Paid Sick Leave, Account with Employee's Provident Fund Organization (EPFO), Account with Employee's State Insurance Corporation (ESIC), or Central Government Health Scheme, provided by the government or employers to protect workers from livelihood insecurity. 73 percent of workers have none of these benefits. Those employed informally and those belonging to lower socioeconomic groups are even less likely to have any job protections. Just 15 percent of informally employed workers have some form of benefits, compared to 82percent of formal workers or 83 percent of regular salaried workers.

Inadequate job protections and the severe economic downturn from the pandemic have renewed the debate over a job guarantee in urban areas of India. Several states in India are introducing urban jobs programmes, particularly for young workers, to prevent the crisis from further developing into long-term unemployment. This is a step in the right direction because even more recent data reveals that easing the lockdown has not fully reversed the patterns of rising unemployment and reduced earnings.

Focusing just on responses since relaxing of the lockdown shows that many low-income and informal workers were not able to work even after the lockdown was lifted (Appendix, A5). The pandemic has already caused large earning losses for these workers and an uneven recovery in the future will put them at risk of falling into poverty. In the midst of the biggest livelihood crisis, urgent action is therefore needed to protect informal workers from a permanent deterioration in their job prospects.

A national commitment of resources for low-income informal workers everywhere in the country would give a start to the recovery process. India already runs the world's largest jobs programme under its National Rural Employment Guarantee Act (NREGA), which entitles rural households to demand a 100 days of work a year from the government. The programme

has seen an increase in take up since the pandemic, and there is some encouraging news. Unemployment in rural areas has dropped back to levels experienced before the pandemic, in part due to seasonal farming activity and government policies such as relief transfers and job support. These factors have further intensified the debate over an urban job guarantee, because urban unemployment rates, even from more recent data for July and August, are hovering higher than similar periods a year before (Centre for Monitoring Indian Economy, 2020).

Table 5 reports the coverage and scope for an urban job guarantee. From the survey, less than a third of urban workers have/had some form of a guarantee of a minimum number of days of work in the year, mostly provided by their employer (41 percent), a government job (17 percent) or provided by a job contractor (16 percent). Over 5 percent of them are covered by NREGA because they have a rural domicile. Salaried workers and those in formal employment are more likely to have a guaranteed minimum days of work, while young workers, low-income workers, and those in informal employment are less likely to have one. Self-employed workers largely have a guarantee of work because they own small businesses or have a contract from their clients.

Table 5: Guarantee of a Minimum Number of Days of Work by Work and Worker Types

	Have Work Guarantee %	Would Like Work Guarantee, if not have one %
All workers	31.2	70.7
Workers by pre-Covid earnings		
Bottom Quartile	36.3	76.8
Quartile 2	17.0	75.0
Quartile 3	23.3	67.8
Top Quartile	53.9	58.0
Informal workers	20.7	70.9
Formal workers	80.6	66.6
Casual workers	21.2	78.6
Self-employed workers	25.0	66.1
Salaried workers	69.6	63.5
Informal low-education workers	17.5	73.4
Informal low-earnings workers	25.1	77.4
Informal OBC/SC/ST workers	16.8	72.5

Informal young workers	21.7	72.7
Informal young low-education workers	19.6	74.7
Informal young low-earnings workers	27.2	76.2
Informal young OBC/SC/ST workers	18.5	73.5
N	8407	5284

Source: LSE-CEP Survey of Work Arrangements 2020.
Have work guarantee is an indicator for whether an individual has or had some form of a guarantee of a minimum number of days of work in the year. Would like work guarantee is an indicator for whether an individual does not have but would like a guarantee of a minimum 100 days of work in the year. Income quartiles are constructed using average earnings in January and February 2020. Formal is an indicator for whether the individual has a written employment contract, informal is an indicator for whether the individual does not have a written employment contract. Low-education is education level of 12th Standard or less. OBC/SC/ST are individuals belonging to Other Backward Class, Scheduled Caste, or Scheduled Tribe. Low-earnings is the bottom quartile according to average earnings in January and February.

70.5 percent of those who do not have a guarantee of a certain number of days of work would like one. Informal workers, those in casual employment, and those in low-income households are more likely to want a work guarantee. Out of those who want a work guarantee, 33 percent say that a guaranteed number of days would be helpful since there is not enough work available, and 49 percent say that there is no job security otherwise. A job guarantee programme would therefore be valued by workers, especially those who are in precarious work arrangements and from disadvantaged backgrounds (Appendix, Table A4 for further details). A full analysis of the value placed by urban workers on having a guaranteed number of days of work is provided as willingness to pay estimates for a job guarantee in Dhingra and Machin (2020).

An urban job guarantee would be particularly important as the crisis lingers on, raising the risk of longer-term unemployment. Urban workers do not expect their job prospects to improve any time soon. 75 percent of workers have a negative view of their employment prospects over the next 3 months. 12 percent say that they will lose their job or that they will have to shut down their business, and 56 percent expect to work fewer hours than usual (Appendix, Table A5). This bleak view is reflected already on the business side too, with 8 percent of our respondents reporting that their workplace had permanently closed down. Negative expectations are much more prevalent among informal and casual workers, who have already borne a disproportionate share of the livelihood crisis.

Efforts to provide a social safety net to informal workers has been on the agenda of policymakers in developing economies for years (The World Bank, 2019). It may finally be time to revive old ideas, such as a universal job guarantee, to protect the livelihoods of many informal workers who are at risk of falling into urban poverty. Their aspirations of a prosperous

life have already been shattered by the pandemic. Life in the city now looks more unequal and precarious. Policy action is needed to counteract these forces to ensure cities continue to provide opportunities for high growth and better jobs for everyone, not just those in secure privileged positions.

India has been hit really hard by the pandemic and the livelihood crisis arising from it. GDP is expected to contract by a "historic" 14 to 26 percent in the April to June 2020 quarter, compared to a growth of 5.2 percent in the same quarter the previous year (Noronha and Suneja 2020). The CEP survey shows that the impact on urban workers has been even more severe than the overall contraction. A majority of workers have gone without pay or assistance during this period. The share of the top quartile of income earners has jumped from 64 percent of total income to 80 percent. Lower-income informal workers have suffered the biggest job and earning losses. They show strong support for an urban job guarantee to overcome the livelihood insecurity unleashed by the pandemic.

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Appendix

Figure A1b shows salaried workers had fewer days with no pay even when they missed work. But Figures A1a and A2b look more similar for casual and self-employed workers, who ended up with more days of unpaid missed work.
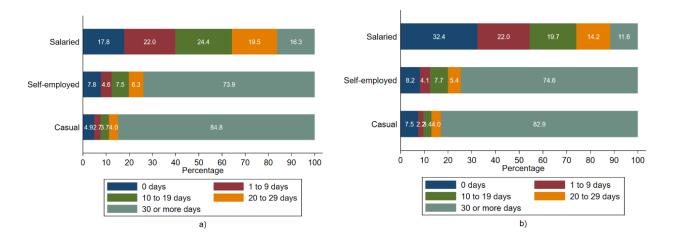

Figure A1: Number of days a) unable to work and b) not paid, by employment category

Lockdown timeline and the impact on employment

The government of India imposed a nation-wide lockdown from the 24th of March to the 14th of April to contain the spread of infection. The national lockdown was extended to May 3rd with some relaxations on the operation of agricultural businesses. In a third phase of the lockdown from May 4th to 17th, the country was divided into three zones according to the number of confirmed cases to identify infection hotspots. This division of districts dictated the types of activities that were allowed. A final phase of the lockdown from the 18th to the 31st of May allowed states more autonomy to decide on the zones and business activities which were allowed to resume.

Sample Characteristics

Table A1 shows that the survey sample is broadly representative of India in terms of key demographics (age, social group, religion) and key employment characteristics (informality defined as lack of a written contract, and average wages). Over-sampling of female workers implies the unweighted sample differs to some degree. For example, the female workforce has much higher shares of graduates than the male workforce (40 percent and 29.5 percent). The survey over-represents low and high income tails, part of which could be a reflection of the changes in economic conditions. These changes are also the reason for higher unemployment

rates, fewer salaried workers and reduced hours worked, compared to similar months in 2017-2018.

Table A1: Characteristics of Workers

	Unweighted	PLFS
Education		
10th Standard or less	45.1	55.9
12th Standard	20.0	11.6
Diploma	1.6	3.2
Graduate	21.5	20.8
Postgraduate	11.7	8.4
Female	35.4	21.5
Mean age (years)	29.1	30.1
Has/Had written employment contract	23.7	23.7
Type of employment last week	34.9	14.1
Casual workers	35.8	33.1
Self-employed workers	29.3	52.8
Salaried workers		
Mean hours worked last week	34.6	55.7
Unemployed on the day of the	26.0	14.8

Sources: LSE-CEP Survey of Work Arrangements 2020; Periodic Labour Force Survey 2017-2018. Values reported are percentages unless stated otherwise.

Table A2: Unemployment by Work and Worker Types

	Pre-Covid Uenmp %	Unemp (last week) %	Unemp + zero hours %	Unemp + zero hours + zero pay received with no financial assistance %
All workers	1.2	15.5	21.7	52.0
Workers by Pre-Covid earnings				
Bottom Quartile	3.2	20.7	28.1	51.7
Quartile 2	0.6	18.6	26.5	67.6
Quartile 3	0.7	17.1	23.4	61.3
Top Quartile	0.7	5.0	7.7	22.0

Informal workers	1.1	17.9	25.4	60.6
Formal workers	1.8	4.5	4.7	11.8
Female workers	2.1	14.4	18.5	38.5
Male workers	0.9	15.9	22.6	55.7
Younger workers (18-25 years)	1.9	16.9	25.1	54.2
Older workers (26-40 years)	0.9	15.0	20.3	51.1
Workers by Education				
12th Standard or less	0.9	17.9	25.4	60.9
Diploma/Graduate/Postgraduate	1.7	10.7	13.9	33.5
Workers by Social Group				
General Category	1.5	9.8	12.4	27.8
Scheduled Castes/Scheduled Tribes	0.8	17.2	25.1	62.1
Other Backward Classes	1.4	19.0	26.4	62.7
Informal low-education workers	0.8	19.1	27.3	65.4
Informal low-earnings workers	3.2	23.7	32.5	60.1
Informal OBC/SC/ST	0.9	18.6	26.9	65.3
Informal young workers	1.7	19.4	29.3	63.4
Informal young low-education workers	1.2	20.1	30.8	67.4
Informal young low-earnings workers	3.8	25.2	35.5	64.1
Informal young OBC/SC/ST workers	1.2	19.5	30.2	67.8
N	8530	8530	8530	8530

Source: LSE-CEP Survey of Work Arrangements 2020.

Income quartiles are constructed using average earnings in January and February 2020. Pre-Covid unemployment is the share of those unemployed for more than 3 months before the survey. Unemployment last week is an indicator for whether the individual was unemployed the week before the survey. Unemployment last week and zero hours worked is an indicator for whether the individual was unemployed the week before the survey or that hours of work were zero. Unemployment last week and zero hours worked and zero pay received with no financial assistance is an indicator for whether the individual was unemployed the week before the survey or that hours of work were zero or the pay in April was zero, and they did not get any financial assistance. Income quartiles are constructed using average earnings in January and February 2020. Formal is an indicator for whether the individual has a written employment contract, informal is an indicator for whether the individual does not have a written employment contract. Young workers are individuals between 18 and 25 years old. Older workers are individuals between 26 and 40 years old. Low-education is education level of 12th Standard or less. OBC/SC/ST are individuals belonging to Other Backward Class, Scheduled Caste, or Scheduled Tribe. Low-earnings is the bottom quartile according to average earnings in January and February.

Table A3: Earning Losses by Work and Worker Types

	Mean Pre-Covid Monthly Earnings (Rs'000)	Mean Earning Losses All (%)	Assist-ance %	If Received Mean Assist-ance as % of Monthly wage
All workers	15.1	47.9	23.4	43.9
Workers by Pre-Covid earnings				
Bottom Quartile	3.1	68.0	32.0	43.9
Quartile 2	7.3	85.3	20.2	20.2
Quartile 3	12.5	74.1	18.4	34.4
Top Quartile	40.5	29.3	25.1	74.8
Informal workers	12.1	63.3	18.4	27.2
Formal workers	29.5	17.3	46.9	74.7
Female workers	15.8	34.9	30.9	50.1
Male workers	14.9	51.6	21.3	41.4
Younger workers (18-25 years)	12.2	54.3	23.4	44.5
Older workers (26-40 years)	16.4	45.9	23.4	43.6
Workers by Education				
12th Standard or less	9.4	75.2	23.5	31.6
Diploma/Graduate/Postgraduate	27.5	28.0	23.1	70.0
Workers by Social Group				
General Category	25.9	24.7	30.7	69.0
Scheduled Castes/Scheduled Tribes	10.1	72.6	20.4	26.6
Other Backward Classes	11.4	69.6	20.1	29.3
Informal low-education workers	9.1	82.1	19.9	22.0
Informal low-earnings workers	3.3	76.6	23.9	33.6
Informal OBC/SC/ST	9.9	78.6	18.8	23.9
Informal young workers	10.5	67.6	17.3	35.9
Informal young low-education workers	8.6	80.9	18.2	27.1
Informal young low-earnings workers	3.2	70.0	20.5	39.6
Informal young OBC/SC/ST workers	9.3	78.0	17.1	34.2
N	8308	8160	8407	2243

Source: LSE-CEP Survey of Work Arrangements 2020.

Pre-Covid earnings are average earnings in January and February 2020. Earning losses is constructed as 1 - (Average earnings in January and February / Average earnings in April and May). Financial assistance is the share of the sample who received financial assistance from their employer

or the government. Financial assistance received as a percentage of the monthly earnings is the amount of the financial assistance received from the government or the employer as a share of the monthly wage estimated by multiplying daily wage by 30. Income quartiles are constructed using average earnings in January and February 2020. Formal is a dummy for whether the individual has a written employment contract, informal is a dummy for whether the individual does not have a written employment contract. Young workers are individuals between 18 and 25 years old. Older workers are individuals between 26 and 40 years old.Low-education is education level of 12th Standard or less. OBC/SC/ST are individuals belonging to Other Backward Class, Scheduled Caste, or Scheduled Tribe. Low-earnings is the bottom quartile according to the average income in January and February.

Table A4: Job Guarantee by Work and Worker Types

	Have Work Guarantee %	Would Like Work Guarantee, if not have one %
All workers	31.2	70.7
Workers by pre-Covid earnings		
Bottom Quartile	36.3	76.8
Quartile 2	17.0	75.0
Quartile 3	23.3	67.8
Top Quartile	53.9	58.0
Informal workers	20.7	70.9
Formal workers	80.6	66.6
Female workers	43.2	78.1
Male workers	28.0	69.1
Young workers (18-25 years)	32.6	72.4
Older workers (26-40 years)	30.7	70.0
Workers by Education		
12th Standard or Less	23.5	73.3
Diploma/Graduate/Postgraduate	47.4	62.5
Workers by Social Group		
General Category	55.6	63.4
Scheduled Castes/Scheduled Tribes	24.5	74.6
Other Backward Castes	16.3	69.8
Informal low-education workers	17.5	73.4
Informal low-earnings workers	25.1	77.4
Informal OBC/SC/ST workers	16.8	72.5
Informal young workers	21.7	72.7

Informal young low-education workers	19.6	74.7	
Informal young low-earnings workers	27.2	76.2	
Informal young OBC/SC/ST workers	18.5	73.5	
N	8407	5284	

Have work guarantee is an indicator for whether an individual has or had guarantee of minimum number of days of work. Would like work guarantee is an indicator for whether an individual does not have but would like guarantee of minimum 100 days of work. Income quartiles are constructed using average earnings in January and February 2020. Formal is an indicator for whether the individual has a written employment contract, informal is an indicator for whether the individual does not have a written employment contract. Young workers are individuals between 18 and 25 years old. Older workers are individuals between 26 and 40 years old. Low-education is education level of 12th Standard or less. OBC/SC/ST are individuals belonging to Other Backward Class, Scheduled Caste, or Scheduled Tribe. Low-earnings is the bottom quartile according to average earnings in January and February.

Table A5: Unemployment before and after 31st of May, and expectations for future by Work and Worker Types

	Unemp zero hours)	Unemp +zero hours)	Future Expectations
	Pre %	Post %	%
All	21.0	23.9	74.8
Informal workers	26.0	24.3	76.9
Formal workers	2.7	10.9	64.8
Casual workers	.	.	80.6
Self-employed workers	.	.	78.3
Salaried workers	.	.	57.5
Workers by Pre-Covid Earnings			
Bottom Quartile	25.7	30.9	75.2
Quartile 2	28.3	25.1	83.4
Quartile 3	21.2	25.4	77.6
Top Quartile	3.9	19.5	60.2
N	6131	2276	8407

Unemployment last week and zero hours worked is the share of those who were unemployed the week before the survey or that worked for zero hours. Sample is divided to before and after 31st of May. Future expectations is an indicator for whether the individual expects to lose current job/shut business, work fewer hours, or stay unemployed and not

find work. Income quartiles are constructed using average earnings in January and February 2020. Formal is an indicator for whether the individual has a written employment contract, informal is an indicator for whether the individual does not have a written employment contract.

Box A1: Variable definitions

Income quartiles are constructed using average earnings in January and February 2020.

Pre-Covid unemployment is the share of those unemployed for more than 3 months before the survey.

Unemployment last week is the share of those unemployed the week before the survey.

Unemployment last week and zero hours worked is the share of those who were unemployed the week before the survey or those who worked for zero hours the week before the survey.

Unemployment last week and zero hours worked and zero pay received with no financial assistance is the share of individuals who were unemployed the week before the survey or worked zero hours the week before the survey or had zero pay in April, and they did not get any financial assistance.

Pre-Covid earnings are average earnings in January and February 2020.

Earning losses is constructed as 1 - (Average earnings in January and February / Average earnings in April and May).

Financial assistance, those received, is the share of individuals who received financial assistance from their employer or the government.

Financial assistance, as a percentage of monthly earnings is the amount of financial assistance received from the government or the employer as a share of the monthly wage estimated by multiplying daily wage by 30.

Have work guarantee is an indicator for whether an individual has or had some form of a guarantee of a minimum number of days of work in the year.

Would like work guarantee is an indicator for whether an individual does not have but would like a guarantee of a minimum 100 days of work in the year.

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