

Economic Conditions of the Cambodian Urban Informal Workers during the COVID-19 Pandemic

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INTRODUCTION

The impetus for this study comes from a field observation on informal workers in different urban areas in the Phnom Penh city during the COVID-19 pandemic. The prevailing pandemic has devastated economies around the world, and in particular, the informal workers, who are generally employed on a seasonal, casual, or temporary basis, and lack social protection, have suffered the worst. To mitigate the social and economic impacts of the pandemic on poor and vulnerable households, the Royal Government of Cambodia launched a nationwide cash relief program in June 2020. It is believed that an effective mitigation program to counteract the negative impact of COVID-19 requires evidence-based research, and this has prompted us to carry out the present study.

Emerging from Wuhan in December 2019, the “coronavirus disease 2019” (COVID-19) pandemic has drastically altered the world economy and affected every aspect of life. While the head of the International Monetary Fund (IMF) views that the world has faced the worst economic crisis since the Great Depression of the 1930s, and emerging markets and developing countries were the hardest hit (British Broadcasting Corporation [BBC], 2020), the International Labour Organization (2020a) describes the coronavirus pandemic as the worst global crisis since World War II. The World Bank (2021) has estimated -3.5 percent growth of the global economy for 2020. The rapid spread of the virus has not only led to the disruption of supply chains and freezing demand limiting the flows of travel, trade, and investment (Organisation for Economic Co-operation and Development [OECD], 2020), but has also slowed down economic activities in almost all countries due to lockdown and social containment measures. While nearly half of the world’s 3.3 billion workforce were at risk of losing their livelihoods (World Health Organisation [WHO], 2020), in Southeast Asia alone, with every passing month, tens of millions of more workers become vulnerable of sliding into poverty, including many in the middle class. As the pandemic goes on,

temporary job losses have become permanent, and household incomes have plummeted (The Asia Foundation, 2020).

The literature revolving around the effects of the COVID-19 pandemic on economies across the globe reveal how the informal sector, and particularly the informal workers, have truly been devastated. Informal workers make up over 60 percent of the global workforce, representing two billion people (International Labour Organization [ILO], 2018), and are the most vulnerable in the labor market as the majority lack social protection, access to quality health care, and access to productive assets. The full or partial lockdown measures implemented across nations have had a large impact on the livelihoods of the people. Almost 1.6 billion informal economy workers out of a worldwide total of two billion and a global workforce of 3.3 billion, have suffered massive damage to their capacity to earn a living (ILO, 2020b). According to the OECD (2020), the economic shocks will have more medium-term impacts on poverty and welfare, especially among the more vulnerable in society and those who work in the informal economy. A particular concern is the humanitarian and economic toll that the global recession takes on economies with extensive informal sectors that make up an estimated one-third of the GDP and about 70 percent of total employment in emerging markets and developing economies (World Bank, 2020). The pandemic is a major economic and labor market shock. It has led to the unemployment and underemployment of informal workers, particularly the informal wage workers in the agricultural sector, who are about 90 percent of the total agriculture workers in developing economies, employed on a casual, seasonal, or temporary basis, and frequently sidelined by policymakers (Food and Agriculture Organization [FAO], 2020).

The global pandemic has posed an unprecedented threat to the prosperity of Asian countries. Its effects on employment in Asia and the Pacific occur through the reduction in production, increase in trade barriers, declination of global demand, and restrictions on movement causing massive job and income losses, disproportionately affecting people in informal employment, especially daily and hourly laborers, and domestic and cross-border migrants (United Nations Development Programme [UNDP], 2020). The member states of the Association of South East Asian Nations (ASEAN) are not the exceptions to this situation. The data from eight ASEAN member states (except the Philippines and Singapore) indicate that the rate of informal employment ranges widely from 37 percent in Thailand to 90 percent in Cambodia (ASEAN, 2019), and that the rate of informal employment in Cambodia is higher for women (93.8 percent) as compared to men (87 percent). In this context, the counter measures to COVID-19, the partial lockdown, and restrictions on the movement of people have put a huge economic burden, in particular, on women and girls engaged in informal activities with limited access to food, finance, healthcare, and other services.

As mentioned earlier, due to COVID-19, the risks of illness and economic fallout continue in Cambodia. In the light of severe contractions of economic activities and rising unemployment, including large scale devastations to livelihoods, it is imperative to conduct a systematic study on the economic conditions of the urban informal workers before and during COVID-19 as these workers compose a large percentage of the workforce and thus, they require special attention from the government for their protection and survival. Equally, the study is essential to help make timely interventions when preparing for future shocks and responding to economic downturns by reviving activities.

The overall purpose of this chapter is to assess the impact of the COVID-19 pandemic on the informal workers in the capital city of Phnom Penh. In particular, we intend to compare the economic conditions of these informal workers on the basis of their monthly average income, expense, savings, borrowings, and average hours of work per day both before and during the pandemic, when partial lockdown and restrictions on movement are in force. In addition, we contemplate to explore how informal workers in the study area think in favor of other alternatives to overcome the crisis and lead their lives. Therefore, understanding the economic conditions of the informal workers before and during the pandemic, and exploring how they consider alternatives to carry on with their lives, should be a welcome addition to the literature. Furthermore, the study is a necessity to both the government and non-governmental organizations that consider appropriate interventions for the protection of lives in the worst affected sectors of the society.

In the following sections, we present the literature concerning the impact of the COVID-19 pandemic on the economy and society along with the study methodologies, empirical results, and discussions, followed by the implications for individuals, organizations, and agencies, and the directions for future research.

LITERATURE REVIEW

In order to better understand the possible economic outcomes of COVID-19, McKibbin and Fernando (2020) have explored seven different scenarios using a modelling technique which demonstrates how a contained outbreak could significantly impact the global economy in the short run. The global pandemic has devastated the lives and livelihoods of people in almost all countries in the world. Assessing the impact of COVID-19 on poverty and food insecurity, Laborde *et al.* (2020) have projected around 150 million people to fall into extreme poverty and food insecurity, whereas Kharas and Hamel's study (2020) has showed 690 million people likely to be in poor households in 2020, compared to their previous estimate of 640 million people. The adverse impact of the pandemic has landed far more severely on the vulnerably placed informal and unorganized workers as well as on people below the poverty line,

and has thereby, exacerbated existing inequalities in the economic system (The Pioneer, 2021). In addition, 1.6 billion learners—approximately 91 percent of the world's enrolled students have been affected due to the closure of schools around the world (United Nations Educational, Scientific and Cultural Organization [UNESCO], 2020). The research in the developing nation of Brazil has unveiled the economic impacts of the social isolation and lockdown which have mainly withdrawn informal sector workers from the workforce and led to short-term technological effects indirectly impacting formal sectors due to intersectoral links regarding input and output (dos Santos *et al.*, 2020). The research in another Latin American country, Colombia, has revealed a huge economic loss measured by the decline in the nation's GDP due to the lockdown imposed by the national government. While the formal sector workers have had some loss of income, the informal sector workers have had a complete loss of income which has led to a significant drop in the household demand for goods and services (Bonet-Morón *et al.*, 2020).

A study of the internal migrant workers in the informal sector of India has disclosed that the workers who had previously migrated from lower Human Development Index (HDI)-scored states to higher HDI-scored states in search of better paid jobs, have faced tough challenges with the higher informalization of work that has caused them to become homeless, food deprived, and solely dependent on the government for support, having no way to go back to their homeland (Das, 2020). Based on the official data of the periodic labor force survey 2017–18, the estimation of Mehta and Kumar (2020) has shown that the worst affected informal workers in India were around 40 million, mostly the casual or daily wage workers involved in the top ten vulnerable occupations in urban areas. However, according to ILO (2020b), in India, with a share of almost 90 percent of people working in the informal economy, about 400 million workers in the informal economy are at risk of falling deeper into poverty during the crisis. In Thailand, the marginalized and socially excluded informal sector workers have faced severe challenges in regard to their lessened income, reduced savings, and inability to pay enough for food, rent, and other day-to-day living expenses, or basic necessities (Wichaya *et al.*, 2020).

Infectious diseases and rural livelihood in developing countries, particularly in resource-poor communities, have shown interrelations of many causes and consequences on health, poverty, and livelihood (Mphande, 2016). In rural areas, due to lockdowns and restrictions of movement as well as disruptions of agri-food supply chains and markets, the livelihoods of especially the self-employed and wage workers are at risk (FAO, 2020). A study in Indonesia has revealed that the informal workers, both in agriculture and non-agriculture, have been affected by the global pandemic. It has also highlighted the impacts of the pandemic on informal employment and incomes, readiness in dealing with the pandemic, and the livelihood conditions of informal workers. Most workers have experienced a decline in incomes, both in the agriculture and non-agriculture sectors, and while as many as 64.4 percent of the

respondents working in informal agriculture have experienced a decline in incomes, 26.7 percent of the respondents have even lost their incomes as the market system and supply chains were disrupted (Pitoyo *et al.*, 2020).

To monitor the household-level impacts of COVID-19 in Cambodia, the World Bank, in collaboration with the National Institute of Statistics (NIS), had designed and implemented the High Frequency Phone Survey (HFPS) of households. The first-round survey data collection had started in mid-May 2020, and the same households were called back every eight weeks and tracked over 10 months. The HFPS samples were drawn from the nationally representative Living Standard Measurement Study Plus (LSMS+). The survey had followed up with 1,364 households in LSMS+ but was successfully completed for 700 households with a response rate of 51 percent. The highlights from the first-round survey had revealed that about 71 percent of respondents were able to continue working, while 12 percent of respondents who had been working prior to the COVID-19 outbreak, had stopped working due to the closures of business and COVID-19-related restrictions. The remaining 15 percent of respondents had not worked before and after the outbreak. Further, the COVID-19 outbreak has significantly affected non-farm household businesses as about 73 percent of them had reported a decline in revenues in April 2020 as compared to March 2020, while eight percent had no revenue at all. Again, COVID-19 induced economic slowdown has resulted in a reduction in income from all sources except pensions. More than 80 percent of the respondents have reported a decline in their total household income, and the most affected households have been those relying on non-farm family businesses. To cope up with the income losses, six in 10 households have resorted to reducing both food and non-food consumption, while other households have credited purchases (37 percent of respondents) or borrowed cash from friends and family (27 percent). The reduction in food consumption has resulted in some Cambodians facing food insecurity (Karamba *et al.*, 2020).

The second-round of the HFPS of households conducted during August–September 2020 had gathered information from a sample of 1,667 households. It was revealed from the survey that employment had remained steady between May and August 2020 as there were fewer disruptions to work activities. The share of respondents who were working was 71 percent in May 2020 (first-round survey) and this was moderately the same in August 2020 (second-round survey) at 70 percent (Karamba & Tong, 2020). However, despite the relatively steady employment, losses to household income have remained widespread, and the non-farm business activities have been negatively affected due to weaker demand in the market. Among the household businesses who had reported less or no revenues, about 88 percent of them have reported having fewer or no customers.

The third-round of the HFPS of households implemented during October–November 2020 had gathered information from a sample of 1,665 households. As revealed, the share of the respondents who had worked in the last seven days had slightly declined to 65 percent in October 2020 as against 70 percent in August 2020. About 54 percent of the households had reported having made less or no revenues in October compared to 64 percent in August, and 81 percent in May. 84 percent of the households with a non-farm business had reported having fewer or no customers as the main reason of not generating income by their businesses. In addition, 51 percent of the households had experienced a decline in income from August to October 2020 as compared to 63 percent who had experienced a decline between May and August 2020, and 83 percent between the COVID-19 outbreak and May to June 2020 (Karamba *et al.*, 2021).

The main findings from the fourth-round survey based on a sample of 1,687 households conducted during December 2020 – January 2021 show that 72 percent of the respondents had been employed in December, remaining below its pre-pandemic level when 82 percent of respondents were working. The negative impacts of the COVID-19 pandemic on non-farm family businesses remain substantial—58 percent of the households operating non-farm businesses had reported having made “less” or “no revenue” relative to the previous month. About one in two households continued to report that their household income had declined relative to the last survey. An increasing share of households have had to borrow, delay payment obligations, and take on additional income-generating activities to cope up with the COVID-19 crisis. Around 60 percent of the households had perceived their current well-being and economic status to be lower than the previous year. Food insecurity had remained unchanged between October and December 2020 (Karamba *et al.*, 2021).

The fifth-round of the HFPS of households implemented in March 2021 was based on a sample of 1,688 households. The results have shown that employment has remained relatively unchanged at 69 percent in March 2021. The negative impacts of the COVID-19 pandemic on non-farm family businesses have remained substantial. As reported, half of non-farm household businesses have continued reporting earning “less” or “no revenue” relative to the month prior in March 2021. 78 percent of the households operating a non-farm business have reported having fewer or no customers as the primary reason for not generating revenue or generating lower revenue. The lower demand has disproportionately affected the households. Again, 45 percent of households have experienced a fall in income between December 2020 and March 2021. Thus, widespread reductions in household income have carried on (Karamba *et al.*, 2021).

COVID-19 has significantly impacted the Cambodian economy and prosperity of the people. Based on a phone-based survey, UNDP (2021) has revealed that women

saw a sharper fall in their average income. The highest 18 percent of female informal workers have reported unemployment, and their average weekly income has continued to decrease 23 percent in October 2020. In order to assess the socio-economic impacts of the COVID-19 crisis on vulnerable workers in the informal sector such as the entertainment, construction, transportation, and street vending sectors in Cambodia, the study by Action Aid Cambodia and BBC Media Action (2020), focusing on 416 workers in Phnom Penh and Siem Reap, have revealed that 97 percent of female workers affected by COVID-19 have faced lessened monthly average income from US\$250 to US\$106, while 23 percent of them have earned less than US\$1.90 per day. For the male workers, 93 percent of them have been affected and their monthly average income has decreased from US\$340 to US\$163, while 16 percent of them have earned less than US\$1.90 per day. In addition, the study has found that these groups have been left behind by most of the existing interventions due to their mobility, working condition, and lack of coverage by a social protection scheme. Similarly, a rapid assessment by World Vision International Cambodia (2020) which had included a household survey, a survey of the leaders of agricultural cooperatives, and a series of key informant interviews in selected provinces in Cambodia, has revealed the severe impact of COVID-19 on livelihoods, food security, and education, especially among the most vulnerable families. More than 72 percent of the respondents have lost or experienced a reduction of their incomes, and the most vulnerable families have been workers from construction and the garment industry, returnee migrants, petty traders, small scale farmers, and families with debts. Similarly, 80 percent of the surveyed leaders of agricultural cooperatives have reported a decline in income for various reasons such as lower selling price and productivity, challenges in accessing markets, etc. In addition, 71 percent of the respondents have stated their limited ability to meet food expenses, while more than one-third of the respondents have mentioned about no food stock at home.

COVID-19 has exposed the underlying flaws of Cambodia's current economic model, resulting in livelihood crises for many people. The economic impacts of the pandemic are severe for the working-classes and small businesses, especially for women in both the formal and informal economic sectors, rural communities, sex and entertainment work, and the garment manufacturing sector. For some garment workers, factory closures have led to the loss of jobs and income; for some others working in factories operating at half capacity, they have been dependent on their factory wages and subsidies from the government to make ends meet. However, in both cases, women have been experiencing difficulties in paying their room rents and repaying their debts to microfinance institutions, commercial banks, and money lenders (Ros, 2020). In the light of COVID-19, to understand the returning migrants' challenges and vulnerabilities, the International Organization for Migration Cambodia (2020) has conducted a phone-based survey among 242 respondents in five provinces

during June 2020. The results have revealed that while nearly 40 per cent of the respondents have reported to have no income, another 41 per cent have had an average monthly household income of US\$100 to US\$500. Nearly all of the respondents have expressed concern in their ability to find employment as their income levels have decreased. The study has revealed that since their return to Cambodia, returning migrants have faced various socio-economic vulnerabilities and challenges. A recent survey (March–April 2021) by World Vision International Cambodia (2021) among 621 households and 619 children aged 11–18 years old in four different locations (Preah Vihear, Siem Reap, Kampong Chhnang and Phnom Penh) in Cambodia has highlighted a reduction in the average income per week per household from US\$63 before the pandemic to US\$35 currently. Moreover, 22 percent of the respondents have reported a drop in their income up to US\$50 per week among those who earned US\$50 and above. While a significant number of jobs have been lost in all sectors, most remarkably, the findings uncover that households in Phnom Penh have been more affected than the provinces and as a result, have faced increasing difficulties to cover their necessary living expenses.

Thus, the review of empirical studies has emphasized how a health crisis has devastated all the economies across the globe, including Cambodia, and how the worst sufferers typically belong to marginalized groups within populations such as migrants, displaced people, and informal workers, who face a trade-off between safeguarding their lives and livelihoods. In this context, our intention is to fill up the gap in literature by assessing and comparing the economic conditions of the informal workers both before and during the COVID-19 pandemic in the study area.

METHODOLOGY

Sample Design

We have purposively selected the capital city of Cambodia as our area of study. The reason for focusing on Phnom Penh is mainly due to the presence of diversified business activities and opportunities for informal workers to engage in various activities.

The most prevalent informal economic activities in Phnom Penh such as street vending, street-side vehicle repairing, dressmaking and tailoring, hairdressing, roadside gasoline selling, spa and massage therapy, auto rickshaw driving, car-motor washing, and housekeeping were taken into account for the study. As the exact population of the informal workers in Phnom Penh was not available, we used the Cochran (1963) formula to calculate an ideal sample size given the desired level of precision (5 percent), desired confidence level (95 percent), and estimated proportion of the population (50 percent). Based on the formula ($n = Z^2pq/e^2$), the sample size for the study was

determined as 384. The percentage representation of the different types of informal activities in the sample are shown in Figure 4.1. We have used snowball sampling for the selection of sample respondents for the interviews.

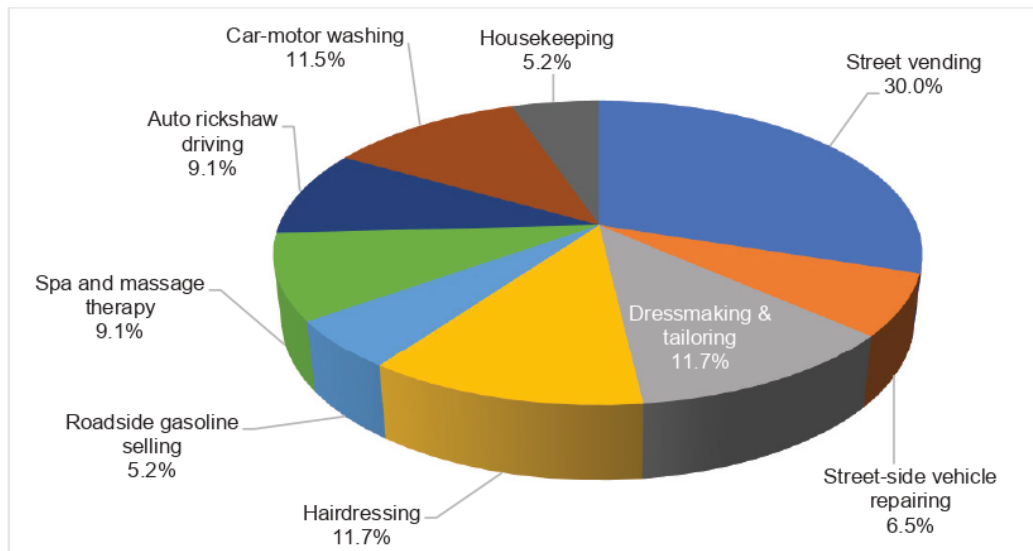


Figure 4.1: Representation of Economic Activities within the Sample of the Study (%)

Source: Field Survey.

Among the 384 participants in our study, a majority of them are street vendors (30 percent) as a large number of informal workers usually opt for street vending due to convenience in starting work and so, they are higher in population and more accessible for research as well. This is followed by an equal number of respondents in dressmaking and tailoring work and hairdressing activities (11.7 percent). Those in car-motor washing come next (11.5 percent), followed by both auto rickshaw drivers and spa and massage therapists (9.1 percent), street-side vehicle repairing mechanics (6.5 percent), and the remaining two categories of housekeepers and roadside gasoline sellers (5.2 percent).

Methods of Data Collection

Primary data have been collected from the sample respondents through direct personal interviews and telephonic interviews. While conducting the physical interviews, we followed the government stipulated COVID-19 protocol. We used a semi-structured questionnaire in collecting the primary data. As the participation of the respondents in the survey was voluntary, no financial incentives were provided to them.

Data Analysis

We have used both quantitative and qualitative methods in analyzing the data gathered from the respondents. The mean values of monthly income, expense, savings, borrowings, and hours of work per day, over a period of six months before the COVID-19 pandemic (prior to December 2019) and during the COVID-19 pandemic (October 2020 to March 2021), were compared to visualize the changes in the economic conditions of the informal workers in the target area. To examine this, we carried out the 'paired t-test'. We sought qualitative information from the respondents through open-ended questions to mark their understanding on the complex situation of the pandemic and thoughts on paths to overcome the crisis. Data gathered from the respondents along with their opinions are analyzed as per the objectives of the study.

EMPIRICAL RESULTS AND DISCUSSIONS

Socio-Demographic Profile of the Study Participants

The socio-demographic profile of the sample informal workers in terms of their sex, age, marital status, educational levels, number of members in the family, and number of earning members in the family are discussed below.

Gender Representation of Sample Workers

With regard to the gender representation of the selected samples, we overall have a higher number of female respondents (55.5 percent) than male respondents (44.5 percent) in the study. However, looking into this category wise, we find some work to be gender biased. While auto rickshaw driving and street-side vehicle repairing are completely male dominated fields (100 percent), housekeeping and spa and massage therapy work are mostly female dominated (100 percent). Roadside gasoline selling is majorly done by men (75 percent), whereas street vending is largely carried out by women (69.6 percent). Dressmaking and tailoring (48.9 percent male; 51.1 percent female), hairdressing (44.4 percent male; 55.6 percent female), and car-motor washing (43.2 percent male; 56.8 percent female) are almost taken up equally by both men and women (Figure 4.2).

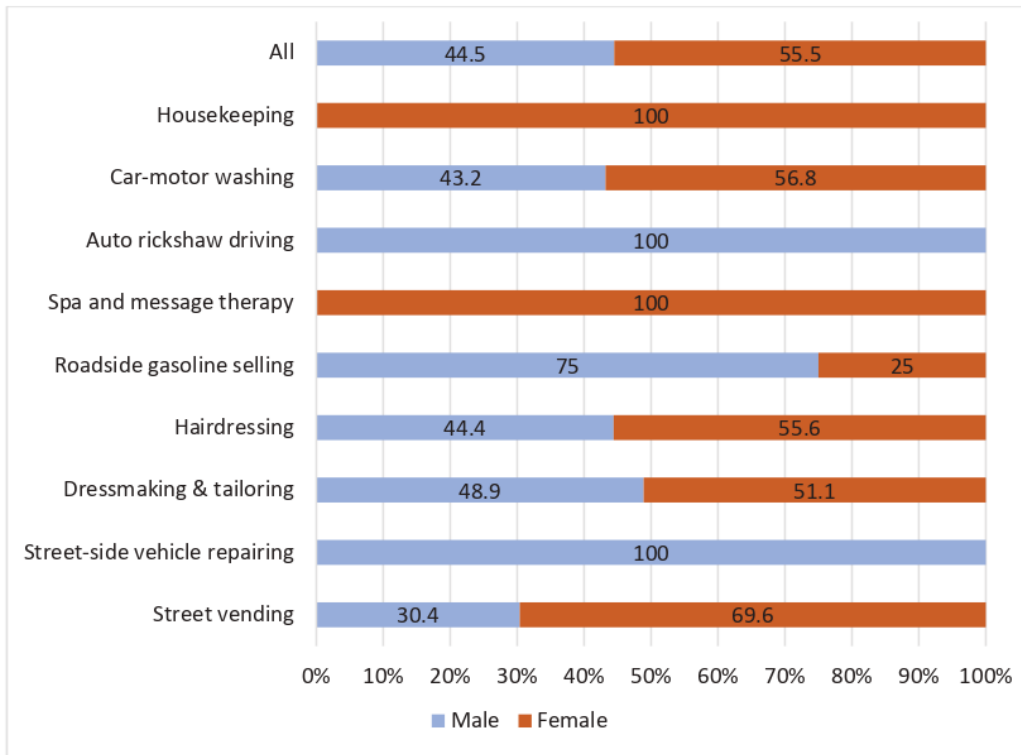


Figure 4.2: Gender Representation of Samples (%)

Source: Field Survey.

Age Distribution of Sample Workers

The sample respondents are categorized into three age-groups: 18–30 years; 31–43 years; and, 44–56 years. Among these age-groups, while the highest percentage of the respondents belong to the youngest group of 18–30 years (80.5 percent), the lowest percentage of the respondents are part of the oldest age group of 44–56 years (4.2 percent). Considering the marital status of the sample respondents, a large number of them are single (68.2 percent), followed by about a quarter who are married (24 percent). The other surveyed workers are divorced (5.2 percent), and the least number of participants are separated (1.3 percent) and living with their partners (1.3 percent).

Educational Level of Sample Workers

As revealed, the highest percentage of respondents have attained primary level education (37.2 percent), followed by 33.1 percent and 12.2 percent of the surveyed workers who have completed secondary level education and vocational education

respectively. The representation of workers from high school and higher education are 8.1 percent each. Furthermore, 1.3 percent of the sample participants do not have any formal education.

Family Size and Earning Members of Sample Workers

The sample respondents came from families with differing sizes, with the largest having eight family members and the smallest having two members. 27.6 percent, 24.7 percent and 20.3 percent of the study participants are part of a three-member, five-member, and six-member family respectively. More than one-fourth of the respondents have families of either two members or four members. The remaining 1.6 percent have the largest families of seven members or eight members (Table 4.1).

The earning members in the families of the sample workers vary from one to five. It is observed that the highest, 37 percent, of the respondents' families have two earning members, followed by 24.7 percent of the surveyed workers' families only having one earning member. Just less than one-fifths of the surveyed workers each have three earning members (19 percent) or four earning members (18 percent) in their families. The least 1.3 percent have five earning family members (Table 4.1).

Table 4.1: Family Size and Earning Members in the Family of Sample Workers

<i>Members in each family</i>	<i>1</i>	<i>2</i>	<i>3</i>	<i>4</i>	<i>5</i>	<i>6</i>	<i>7</i>	<i>8</i>	<i>All</i>
% of families of workers	–	9.9	27.6	15.9	24.7	20.3	1.1	0.5	100.0
<i>Earning members in each family</i>	<i>1</i>	<i>2</i>	<i>3</i>	<i>4</i>	<i>5</i>	<i>6</i>	<i>7</i>	<i>8</i>	<i>All</i>
% of families of workers	24.7	37.0	19.0	18.0	1.3	–	–	–	100.0

Source: Field Survey.

Number of Years of Work of Sample Workers

Looking into the number of years the sample informal workers have been doing their current job, an almost equal number of participants have said to be doing their job for less than a year (32.3 percent) and more than three years (31.5 percent). This is followed by the respondents who have been continuing their present work for one to two years (25.8 percent), and only about one-tenth (10.4 percent) have been involved with their work for two to three years. As revealed from the study, higher percentage of female workers (45.1 percent) work for less than a year, whereas 53.2 percent male participants seem to work for more than three years.

Number of Days in a Week Sample Workers Work

So far as, the number of days in a week in which the participant informal workers work, most of them (87.5 percent) do so every day of the week, noting a higher percentage of female respondents (90.6 percent) than male respondents (83.6 percent). 11.5 percent of the sample informal workers work for about five to six days a week, and the least number of them (one percent) solely work for three to four days. This data reveals the plight of the informal workers who they have no choice but to work throughout the week because of their very low earnings.

Type of Location of Work of the Sample Workers

When questioned about the premise/location where the sample informal workers carry out their work, most of the male and female respondents have said to have a permanent location by the roadside (70.3 percent), followed by a fixed location in a market (15.9 percent). However, some of the participants do not have any specific location for work (6.8 percent), and the least number of respondents work by or at the bus/taxi station (4.2 percent), garbage area (1.5 percent), and hawking (1.3 percent) as shown in Figure 4.3. The major reason of choosing to work at a particular place, especially by the roadside or at the market is for greater accessibility of the customers with a hope to enjoy higher sales.

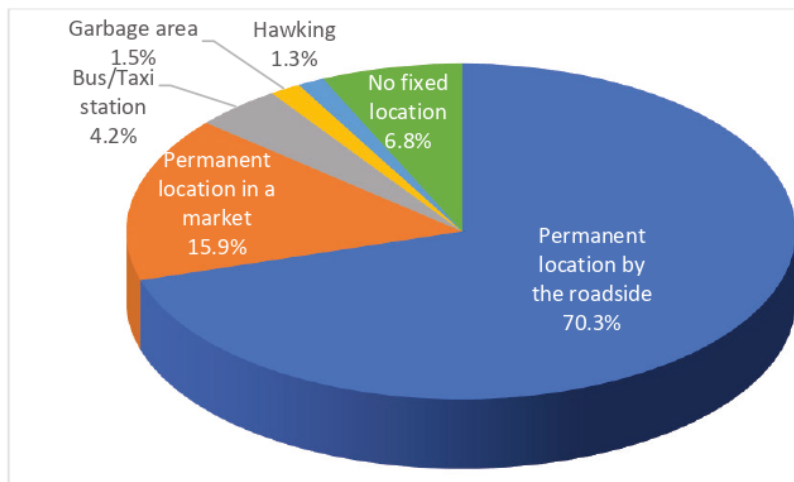


Figure 4.3: Type of Location of Work of the Sample Workers (%)

Source: Field Survey.

Value of Personal Assets of the Sample Workers

As revealed by the data, a majority of the informal workers have personal assets worth less than US\$1000 (61.7 percent), which is mostly the case for female workers (75.6

percent) as compared to male workers (44.4 percent). This is followed by about one-fifth of the respondents who have assets of a total value of US\$1000 to less than US\$2000 (20.3 percent: male 27.5 percent; female 14.6 percent). The remaining sample workers have assets worth US\$2000 to less than US\$3000 (10.9 percent: male 15.2 percent; female 7.5 percent), and US\$3000 and above (7.1 percent: male 12.9 percent; female 2.3 percent). Thus, considering all the categories, male workers hold a higher total value of personal assets as opposed to their female counterparts.

Old Age Provision of the Sample Workers

Coming to the topic of provisions made for old age, most of the sample respondents currently do not have any plans for their old age (81.8 percent), with an almost equal number of female respondents (82.2 percent) and male respondents (81.3 percent). In addition to this, a few of the participants are unsure of their old age situation at the present (2.6 percent). Nonetheless, some of the sample informal workers have made provisions for their old age already (15.6 percent), which consists of a higher number of male workers (18.7 percent) than female workers (13.1 percent). The ability to make plans for old age depends on numerous factors such as a stable source of earnings, a fixed flow of income, considerable savings, foreseeable economic conditions, and more, which the informal workers lack, unlike workers in the formal sector.

Economic Conditions of Workers Before and During the COVID-19 Pandemic

The economic conditions of the sample respondents have significantly worsened due to the COVID-19 pandemic. Activities in the informal sector have been disrupted due to the imposition of full and/or partial lockdown of business units and restrictions on the movement of people in the city. As a result, daily hours of work have fallen, and there has been a huge decline in the income and savings of the workers, which is reflected through their lower expenditure and higher borrowings.

So far as the monthly mean income is concerned, it has fallen by 50.35 percent, from a monthly mean income of US\$244.66 before the pandemic to US\$121.48 during the pandemic (Table 4.2). A fall in more than half of the monthly mean income is observed for the workers engaged in various business activities: street-side vehicle repairing; dressmaking and tailoring; hairdressing; spa and massage therapy; and auto rickshaw driving. Further, the workers engaged in street vending and roadside gasoline selling have also experienced a fall in their monthly mean income close to 50 percent during the pandemic. Nonetheless, among all the categories of activities, the monthly mean income of the housekeeping workers has the lowest percentage (15.93) fall as most of them engaged in housekeeping have continued

their work in spite of the lockdown. However, as some of the housekeepers have been engaged for fewer hours of work during the pandemic as compared to earlier, there has also been a fall in their monthly mean income. The fall in the monthly mean income of the informal workers has a negative impact on their monthly mean expenses. As shown, their monthly mean expenses have fallen by 33.85 percent, from the monthly mean expense of US\$199.92 before the pandemic to US\$132.25 during the pandemic. The highest percentage fall in the monthly mean expenses, that is above two-fifth, has been the case for workers engaged in hairdressing activity. For workers in other economic activities such as dressmaking and tailoring, auto rickshaw driving, spa and massage therapy, and roadside gasoline selling, the fall in their monthly mean expense has been more than one-third as compared to prior the pandemic. Similar to how the workers in housekeeping have the lowest percentage fall in their monthly mean income, they also have the lowest percentage (8.33) fall in their monthly mean expense. By comparing the percentage fall in the monthly mean income and the monthly mean expense of workers engaged in all categories of economic activities, it is revealed that the percentage fall in the monthly mean expense has been less than that in the monthly mean income. This occurred as the workers need to spend a minimum amount for their daily expenses, and due to the fall in their monthly income, they are bound to either use their previous savings or end up with borrowings.

The monthly mean savings of the workers have also fallen by 96.61 percent, from monthly mean savings of US\$53.45 before the pandemic to US\$1.81 during the pandemic (Table 4.2). While the workers engaged in roadside gasoline selling as well as spa and massage therapy have failed to generate any savings during the pandemic, the monthly mean savings of the other workers like those in street vending, street-side vehicle repairing, dressmaking and tailoring, hairdressing, auto rickshaw driving, and car-motor washing, except for housekeeping, have fallen by more than 90 percent during the pandemic. In addition, the informal workers have been especially affected in terms of their borrowings, which have on average increased by 877.88 percent, from a monthly mean borrowing of US\$2.08 before the pandemic to US\$20.34 during the pandemic. Furthermore, workers from all categories have been compelled to borrow funds during the pandemic to support their daily subsistence.

It is not a surprise to see the fall in the daily mean hours of work of the informal workers during the pandemic as compared to previously. The daily mean hours of work have fallen by 45.71 percent, from 10.5 daily mean hours of work before the pandemic to 5.7 daily mean hours of work during the pandemic. For all the categories of workers, the fall in the daily mean hours of work during the pandemic has been 40.0 percent and above. Consequent to the fall in the daily mean hours of work by 45.71 percent, the monthly mean income of the workers has fallen by 50.35 percent (Table 4.2).

Table 4.2: Economic Conditions of Informal Workers Before and During the Pandemic

Types of Business Activities	Monthly Mean Income (USD)			Monthly Mean Expense (USD)			Monthly Mean Savings (USD)			Monthly Mean Borrowings (USD)			Daily Mean Hours of Work		
	Before Pandemic	During Pandemic	% Change	Before Pandemic	During Pandemic	% Change	Before Pandemic	During Pandemic	% Change	Before Pandemic	During Pandemic	% Change	Before Pandemic	During Pandemic	% Change
Street vending	181	94	-48.07	151	104	-31.13	41	2	-95.12	3	22	633.33	11	6	-45.45
Street-side vehicle repairing	235	114	-51.49	190	134	-29.47	54	1	-98.15	3	29	866.67	10	6	-40.00
Dressmaking and tailoring	369	161	-56.37	279	171	-38.71	96	2	-97.92	0	16	-	10	6	-40.00
Hairdressing	272	121	-55.51	228	135	-40.79	54	1	-98.15	1	22	2100.00	10	6	-40.00
Roadside gasoline selling	191	99	-48.17	162	108	-33.33	38	0	-100.0	7	21	200.00	10	6	-40.00
Spa and massage therapy	274	126	-54.01	229	145	-36.68	53	0	-100.0	2	25	1150.00	9	5	-44.44
Auto rickshaw driving	403	186	-53.85	321	201	-37.38	88	1	-98.86	0	23	-	10	6	-40.00
Car-motor washing	164	101	-38.41	143	105	-26.57	32	1	-96.88	2	12	500.00	11	6	-45.45
Housekeeping	182	153	-15.93	156	143	-8.33	31	12	-61.29	3	8	166.67	12	6	-50.00
All (N = 384)	244.66	121.48	-50.35	199.92	132.25	-33.85	53.45	1.81	-96.61	2.08	20.34	877.88	10.5	5.7	-45.71

Source: Primary data.

A comparison of the monthly mean income levels of informal workers before and during the pandemic has revealed a higher percentage of sample respondents (40.9 percent) in the lower income range (US\$1–100) during the pandemic as compared to the percentage of respondents (0.5 percent) before the pandemic in the same income range (Table 4.3). Similarly, a higher percentage of sample workers (34.9 percent) has been found in the lower bracket of monthly mean expense (US\$1–100) during the pandemic as compared to the percentage of respondents (1.3 percent) before the pandemic at the same expense range. Likewise, an increasing percentage of informal workers has been observed during the pandemic without any savings as compared to the percentage of workers before the pandemic. As shown in Table 4.3, while 6.0 percent of the sample workers have had no savings before the pandemic, 91.1 percent of the workers have reported to have no savings during the pandemic. Again, during the pandemic, while 6.3 percent of the workers have had monthly mean savings within the range of US\$1–50, it was 64.6 percent of the workers before the pandemic in the same range of savings. Conversely, by comparing the monthly mean borrowings of workers before and during the pandemic, it has been revealed that the percentage of workers in the higher level of borrowings has gone up remarkably during the pandemic. For example, while only 4.2 percent of the workers have had monthly mean borrowings of US\$21–40 before the pandemic, this percentage has increased to 33.1 during the pandemic. Also, the percentage of workers without borrowings has decreased from 94.5 to 44.3, which indicates the rise of the level of indebtedness of the informal workers (Table 4.3).

A comparison of the economic variables before and during the COVID-19 pandemic has accentuated its negative impact on the lifestyle and standards of living of the informal sector workers. While the mean income, mean expense, and mean savings have fallen significantly during the pandemic as compared to before the pandemic, the mean borrowings have drastically increased. The monthly mean income reached US\$121.48 during the pandemic from US\$244.66 prior to the pandemic. Thus, the t-value has been calculated as 31.528. Consequent to the fall in the monthly mean income, the monthly mean expense and savings had fallen from US\$199.92 to US\$132.25 and from US\$53.45 to US\$1.81 respectively. Therefore, the t-value for expense has been derived as 26.845, and the t-value for savings has been measured as 27.864. However, as the monthly mean borrowings have increased from US\$2.08 to US\$20.34 during the pandemic, the t-value has been found to be 18.230. All the three t-values mentioned are significant at the 0.01 (one percent) level of significance (Table 4.4). As such, it has been clearly revealed that while the income, expense, and savings of the sample workers have badly fallen during the pandemic, their borrowings have sharply gone up due to the negative effect of the pandemic.

Table 4.3: Informal Workers (%) in Different Levels of Income, Expense, Savings, and Borrowings Before and During the Pandemic

No.	Income Range (USD)	Informal Workers (%)		Expense range (USD)	Informal Workers (%)		Savings Range (USD)	Informal Workers (%)		Borrowings Range (USD)	Informal Workers (%)	
		Before Pandemic	During Pandemic		Before Pandemic	During Pandemic		Before Pandemic	During Pandemic		Before Pandemic	During Pandemic
1.	1-100	0.5	40.9	1-100	1.3	34.9	No savings	6.0	91.1	No borrowings	94.5	44.3
2.	101-200	57.0	56.3	101-200	60.7	61.2	1-50	64.6	6.3	1-20	0.3	8.9
3.	201-300	13.5	2.9	201-300	26.0	3.9	51-100	20.6	2.6	21-40	4.2	33.1
4.	301-400	21.9	-	301-400	12.0	-	101-150	7.3	-	41-60	0.8	10.9
5.	401-500	7.0	-	401-500	-	-	151-200	1.6	-	61-80	0.3	1.8
6.	-	-	-	-	-	-	-	-	-	81-100	-	1.0
	Total	100.0	100.0	-	100.0	100.0	-	100.0	100.0	-	100.0	100.0

Source: Primary data.

Table 4.4: Impact of the Pandemic on Economic Conditions of Informal Workers

No.	Economic Variables	Mean USD (\bar{X})	t-value	df	Sig. (2-tailed)
1.	Income before pandemic	244.66	31.528	383	.000**
	Income during pandemic	121.48			
2.	Expense before pandemic	199.92	26.845	383	.000**
	Expense during pandemic	132.25			
3.	Savings before pandemic	53.45	27.864	383	.000**
	Savings during pandemic	1.81			
4.	Borrowings before pandemic	2.08	18.230	383	.000**
	Borrowings during pandemic	20.34			

Note: ** Significant at 0.01 level.

Source: Primary data.

Alternative Solutions to Overcome the Crisis

The results of our study show that while there has been a drastic fall in the sample workers' income, at the same time, to meet the minimum requirements of daily expenses during the pandemic, more than half of these workers (55.7 percent) have borrowed funds from their friends and relatives, whereas before the pandemic, only 5.5 percent were borrowers (Table 4.3). A large percentage of sample workers (92.4 percent) felt an excessive economic burden of maintaining their families due to the disruption of business activities and restrictions on movements.

In this context, we have tried to explore from the sample workers any alternatives they may think is appropriate to overcome the crisis. In response to this, 53 percent of the female informal workers have expressed their interest to acquire technical and vocational skills through short-term training. Also, 33 percent of the female workers engaged in street vending, car-motor washing, or spa and massage therapy have shown interest to change their jobs in favor of other activities like housekeeping or hold the thought of moving back to their homelands to carry out agricultural activities. More importantly, 43.8 percent of the sample informal workers were not able to specify what they would like to do if the disruption of business activities further continued due to the pandemic.

To mitigate the social and economic impacts of the pandemic on the poor and vulnerable households, as a temporary measure, the government of Cambodia had

launched a nationwide cash relief program in June 2020, initially for a period of seven months. But as the pandemic continued, the relief program had been extended until March 2021 and may extend further. The program provided cash transfers to households identified by the government as part of the Identification of Poor Households Program, known as “IDPoor”. As a government initiative, the cash transfer program has been designed to help strengthen social protection in Cambodia in the face of COVID-19, and as of April 2021, 2.7 million Cambodians have benefitted from this program (Vanyuth, 2021). In addition, non-governmental organizations, the private sector, philanthropists, other entities, and individuals have extended their support to the poor families to meet their daily needs.

We have found that the urban informal workers, facing work constraints, have started moving to rural areas to carry out agricultural activities. However, it is quite known that agriculture cannot absorb more labor with underlying disguised unemployment. As such, we intend to suggest some kind of employment scheme by the government for the marginalized labour to reduce the level of prevailing unemployment. This would be an alternative method of earning income for livelihood, and to support family. Also, as the micro, small, and medium enterprises create huge employment opportunities in the country, they need to be supported with liberal credit provisions to enable them to resume their economic activities in a phased manner. Moreover, a provision to reskill workers through short-term training with stipendiary support would help informal workers aiming to shift to other occupations. Finally, a provision to supply necessary food items such as rice at a subsidized rate by the government would help the poorer sections of society.

CONCLUSION

Informal workers are generally employed on a seasonal, casual, or temporary basis. However, their contributions to the national economy through market and non-market activities are enormous, even if not well valued. Vulnerability prevails among them due to the nature and conditions of their jobs and the lack of appropriate social protection. During the ongoing pandemic and its resulting economic shocks, these workers have become even more vulnerable. The full and/or partial lockdown and restrictions on the movement of people to control the spread of the virus have disrupted business activities and brought further risks to the informal workers in terms of losing jobs and income. In our attempt to understand the economic conditions of the informal workers, we believe that the disruptions of business activities have brought significant risks to them in terms of losing jobs and income as most of the informal workers are engaged in work without a valid employment contract or any social protection measures. Taking into account nine categories of informal economic

activities in Phnom Penh city with a sample size of 384 workers, we have mainly tried to compare the change in their monthly mean income, expense, savings, borrowings, and daily mean hours of work both before and during the pandemic. Moving forward, we have considered six months prior to the pandemic and during the pandemic to measure the mean values of the variables.

The empirical evidence shows that consequent to the fall in the daily mean hours of work by 45.71 percent, the monthly mean income of the workers has fallen by 50.35 percent during the pandemic. In addition, the monthly mean expense and savings of the informal workers have plummeted during the pandemic as compared to before the pandemic by 33.85 percent and 96.61 percent respectively. Informal workers have also been negatively affected in terms of borrowings which have on average has increased by 877.88 percent. Moreover, during the pandemic, we have found that a higher percentage of sample respondents have moved to the lower ranges of income and expense. While 6.0 percent of the sample workers have had no savings before the pandemic, it has increased to 91.1 percent during the pandemic. Similarly, while only 4.2 percent of the workers have had monthly mean borrowings of US\$21–40 before the pandemic, this percentage has increased to 33.1 during the pandemic. Finally, the t-test results have emphasized that during pandemic, the income, expense, and savings of the sample workers have significantly fallen in comparison to before the pandemic, while borrowings have immensely soared. Overall, the study reveals deteriorating economic conditions of the informal workers during the COVID-19 pandemic as compared to earlier times. Based on the study findings, we recommend a few alternative solutions to overcome the crisis.

Our study is not free from limitations. First, the work is focused on informal workers engaged in business activities solely in Phnom Penh city, and therefore, our findings may not be generalizable to other areas in Cambodia. However, we assume that similar results will be found in other urban areas with comparable environmental, economic, and socio-political structures. Attempt should be made in future studies to extend the analysis to other urban centres in the country. In addition, we have only taken nine categories of activities, and it would have been better to include all kinds of economic activities undertaken by the informal workers. However, in the absence of a systematic micro-level study focusing on the impact of the COVID-19 pandemic on the urban informal workers in the capital city of Cambodia, the empirical findings of this study have implications for both the government and non-governmental organizations, including the private sector that should consider appropriate interventions for the protection of the informal workers and their families. Mitigating the social and economic impacts of the pandemic on informal workers requires evidence-based research, and this study, therefore, has made an attempt to contribute to that direction.

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