# Rural Women and the COVID-19 Pandemic in Ogun State, Nigeria: An Empirical Study

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## Abstract

The dynamics of COVID-19 were sudden, unexpected, and unprepared for by Nigerian citizens and worldwide. This paper examines the experience of rural women in the Ibogun community, Ogun State, Nigeria, and their perspectives on the COVID-19 pandemic. The study utilised both primary and secondary data sources. Seventy-seven (77) copies of questionnaires were administered using a purposive sampling technique. The Statistical Package for Social Sciences (IBM SPSS Statistics 25) was used to analyse collected data. Findings revealed that the Ibogun community's rural women have adjusted and adapted to the mitigating rules and directives of government towards containing the spread of the COVID-19 pandemic. Results further showed that there had been no occurrence of risk and exposure to the COVID-19 disease in the Ibogun community, which is due to strong adherence to the mitigation rules. It is also noted that government presence in providing supportive items or access to those items was problematic. Furthermore, the lockdown, social distancing and use of facemask were difficult for women in the community to adhere to strictly. The inferential analysis revealed a significant relationship between income and compliance with coronavirus pandemic and lockdown measures. Finally, policy and planning implications are provided with recommendations for improved intervention.

**Keywords:** Compliance, Lockdown, Pandemic (COVID-19), Nigeria, Rural Women

## Introduction

The suddenness and massiveness of coronavirus (COVID-19) remain one of the events to have shaken the world and humanity in the second decade of the twenty-first century. There was hardly any country spared of the adverse consequences of the pandemic. Lives were lost, businesses destroyed, relationships broke in ordeals that redefined many traditional ways the world had been doing things. In global impact and cost, therefore, the havoc of the pandemic was enormous. For example, by June 16, 2020, the extent of the damage was becoming incalculable. The infection rate, globally, had exceeded the 8,000,000 mark with 430,000 deaths recorded. Survivors, the total number of those who managed to not succumb to the infection, stood at half of the total cases at 4,000,000 (Worldometers, 2020). Yet, this “infant stage" that equally marked the recording of massive fatalities spanned only three months of the virus's existence. COVID-19, thus, threw the entire world into a panic and challenged the health professionals, scientists, politicians, and policy makers. Attempts at finding adequate responses led to searching for different directions. Prominent among the containment measures was the imposition of lockdown by many countries that led to the emergence of different measures to mitigate citizens' involuntary confinement to their homes.

Nigeria recorded its index case of COVID-19 on February 27, 2020, in Ogun State. In response and as happening in several other parts of the world, the country introduced various measures to mitigate or contain the spread of the virus (Civil Society Organisation [CSO.], 2020). The measures applied uniformly tend to be from health and political perspectives. They took no notice of the spatiotemporal dimension or characteristics of the different communities. The Nigerian society was deemed to be one, uniform, and the measures evolved by the political and health authorities, therefore applied universally. Between the urban and rural society, therefore, there was no distinction. The COVID-19 protocols evolved along with the penalties prescribed for those who disobeyed them and were meant to apply equally to people in urban and rural settings. Irrespective of social or economic burdens, everyone was expected to conform and adjust to the measures. One group affected by the measures were rural women. They bear a significant burden of the home, children, and the entire family in such a setting. Rural women are at risk exposure to COVID-19 (Phillipson et al., 2020). At the same time, they have major responsibilities as home providers and care givers. This study aims to appraise rural women's perceptions in the face of protocols to contain the spread of the coronavirus. The study further assesses the impact of the COVID-19 outbreak on the rural Nigerian women given their socioeconomic responsibilities to their children and families.

## Problem Description

The COVID-19 pandemic is the second major pandemic the world has encountered in the 21st century. Predating it was the influenza A H1N1 of 2009 (Cheng et al., 2020; C.S.O., 2020). To Vellingiri et al. (2020), however, COVID-19 is the most dangerous global pandemic threat since its outbreak in December 2019. As of April 18, 2020, more than 200 countries/regions had reported confirmed COVID-19 cases. Some of the countries include China, Italy, Iran, South Korea, India, Switzerland, Taiwan, U.S.A., Sweden, Singapore, Sri Lanka, France, Australia, Malaysia, etc. (Chakraborty & Maity, 2020).

A vaccine for the treatment of the virus is yet to be found (Ali & Alharbi, 2020). In a bid to contain its rapid spread, some mitigating strategies evolved. Amongst the strategies were wearing a facemask (Cheng et al., 2020), isolation of patients at the early detection stage of the virus, social distancing to reduce contact transmission, and countrywide shutdown in some cases (Vellingiri et al., 2020). In several countries, life came to a halt as only those classified as essential services were allowed to operate (Chakraborty & Maity, 2020). Schools were forced to close down (Viner et al., 2020; de Paz et al., 2020), local, national, and international travels were put under temporary in several countries, causing serious loss of revenue to the global airline and tourism industries **(**Lone & Ahmad, 2020**)**.

The Federal Government of Nigeria imposed two back-to-back 14-day-long lockdowns in Lagos State, Ogun State and Abuja F.C.T. curtail the spread of COVID-19 (C.S.O., 2020). In those two states and Nigeria's federal capital, there were social costs to the lockdown. Primarily, the lockdown was followed by severe economic and business loss. Many business owners did not anticipate the lockdown of businesses and social activities. Therefore, among the losses incurred were loss of incomes, and as many were in the informal sector, many had to eat into their paltry capital.

For rural women, in particular, the lockdown hit hard (Phillipson et al., 2020). Most of their farm produce had no means of getting to the markets, which were often in the urban centres. The irony is that while the means of their income dwindled (or vanished as they watched most of their perishable goods rot), the responsibility of caring for the family increased the burden they had to bear, since they could not go anywhere. Although the Nigerian government promised to provide palliatives, especially to the most vulnerable families, the programme planning and implementation suffered poor conception. In so many instances, many targeted families in urban centres were not reached, let alone those in rural areas.

For the benefit of guiding the future rationally and knowledgeably in situations of this nature, it is important to learn how rural women were affected by the various strategies imposed by the government at mitigating the spread of the virus. Also important would be

to know how these measures affected the discharge of daily responsibilities and duties. To put it succinctly, how were they able to react or manage the effects of COVID-19 pandemic on their livelihoods, especially their economic and social lives? This question is important in the light of economic justice to rural women, who often are poor and underprivileged yet perform essential roles as home-makers and breadwinners in those communities.

## Aim and Objectives

The study aims to achieve the following objectives:

i. To examine the socioeconomic characteristics of rural Nigerian women based on the study area
ii. To understand rural women's perception of the coronavirus pandemic, the effects of the lockdown measures and the motivation for their compliance
iii. To discuss methods adopted by rural women in adjusting to the coronavirus pandemic
iv. To assess what effects the mitigation strategies had on rural women during the coronavirus pandemic, and lastly,
v. To make recommendations that can assist future planning and policy in case of future occurrence.

## Literature Review

Plagues and epidemics have ravaged humanity throughout its existence. According to Jarus (2020), such plagues often change the course of history and, at times, signaled the imminent end of civilization. Thus, the current COVID-19 pandemic should not be seen as an isolated experience. Jarus further identified major pandemics in history. They include, starting from prehistoric times, around 3000B.C, the plague of Athens; the 430 B.C Antonine Plague; that of A.D 165 – 180, the American Plague; the 16th Century, Great Plague of London from 1665 to 1666. More recently were the various Flu pandemics, the 1889–1890 Spanish Flu; the Asian 1957–1958 Flu; the West African 2014 - 2016 Ebola; and the AIDS Pandemic that began in 1981 and is still with the world today. A noticeable observation about these pandemics was that they tend to have effects regionally, that is, most times they are limited to regions. COVID-19, however, according to Lepan (2020), is departing from the norm, having gone global in scope and consequence.

Several studies have emerged since the outbreak of coronavirus in Wuhan, China, late in 2019 to make humanity's invincible enemy comprehensible to human intelligence. Among the various studies were Lupia et al. (2020); Harapan et al. (2020); Wang et al. (2020), to mention a few. Most of the discussions have centred on the origin of COVID-19, infection rates, causal effects, and others. Researchers have also tried to examine the social, economic, and environmental impact and the lessons from previous coronavirus outbreaks

such as MERS-CoV and SARS-CoV. From Wang et al. (2020), the secondary transmission of coronavirus among households has been a significant point toward understanding the disease's progression since the greater part of the infections has been linked to social interaction within a familial household. On the other hand, Ali's and Alharbi's (2020) interest is the management, treatment, and social impact of the infection. Based on their discovery, they advocated for more prevention as the best option since it is still difficult to say a treatment or cure has been found for COVID-19.

Compared to all of the above, de León-Martínez et al. (2020) entrée was from the perspective of social and environmental risk factors of COVID-19. Their study put in focus a critical analysis of the risk factors associated with COVID-19. From the discovery that the disease bore a significant relationship with chronic respiratory tract infections and pulmonary diseases, de León-Martínez and his team concluded that health should override economic considerations in the policy at containing COVID-19. Remarkable, perhaps, as one of the few to break ranks with the horde of studies on the pandemic, is the investigation by the Organisation for Economic Cooperation and Development [OECD] (2020) focusing on women who were at the centre and core to the fight against COVID-19. To the women's credit is their chivalry and heroism, their indomitable spirit of waging an unrelenting battle against the monstrous disease of our time. To the males' chagrin, is the discovery that 70 percent of the healthcare workforce are women. They were not only at the frontline but boldly faced the dangers and risks that the pandemic exposed them to. Their case is most astounding because the women still do not flinch from shouldering their domestic responsibilities. This is apart from high risks that women generally tend to be exposed to compared to men such as increased risk of abuse and violence at home, and the pains and anguish of being lockdown at home by the menfolk.

Did the various COVID-19 policy responses by governments address women's plight and/or their concerns in any meaningful way? This study takes a leaf from the OECD study to understand rural women's perspectives. The Food and Agriculture Organisation [FAO] (2020) had watered a part of the dam in its study, examining the impact of COVID-19 on informal workers. It concluded that the pandemic triggered a major economic and labour market shock, presented a significant impact in terms of unemployment and underemployment for informal workers. It indicated that rural area show that the livelihoods of self-employed and wage workers were at greater risk to the agro-food supply chains and markets due to the lockdowns and restriction of movements. As a result, families in rural environments experienced more distress and were compelled to employ survival strategies such as selling assets, engaging in child labour, and loans. The study prescribed policies and response measures to foster the expansion of social protection to informal workers in agriculture and rural communities. Singling out rural women, the report mentioned the need for particular actions to help rural women discharge their responsibilities at home.

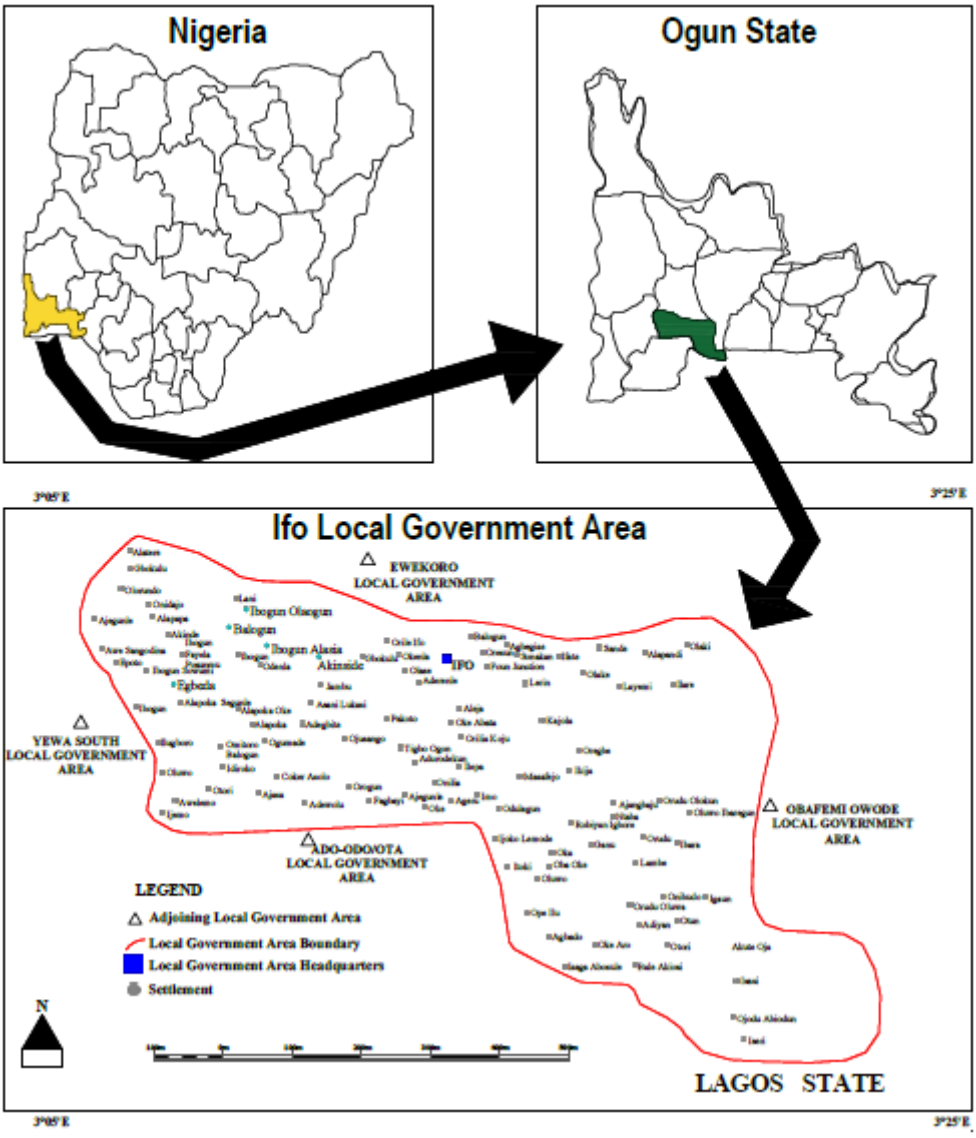
In Nigeria, there has been few studies attempting to understand or draw lessons that could be learnt on the many facets of COVID-19 and its impact on the people and the country. Some emerging resource include Igbokwe's (2020) "Nigerian Maritime Sector: Lessons and Way Forward," and the Lagos State Government's Post-COVID-19 Recovery Seminar. Also, the Nigeria Centre for Disease Control's [NCDC] efforts to release daily situation reports on COVID-19. amongst other contributions (NCDC, 2020). These efforts have not sufficiently addressed the disease that has severe health, economic, social, educational, and political impacts on Nigeria. As the leading Black country in the world (with one in every five Blacks being a Nigerian), how Nigeria was able to combat many of the challenges associated with COVID-19 should naturally be of global interest. It is of particular interest because rural Nigerian women are economic and domestic backbones of families weathered by the COVID-19 storm. This study, therefore, will not only contribute to scientific and empirical knowledge on this vital question but also will help to provide clues as to how to meet the needs of the vulnerable in case of future occurrence. The study will also complement other gender-based studies from the Nigerian perspective.

## Study Area

The study area, Ibogun village, is located in the Ifo Local Government Area (LGA) of Ogun State in Southwestern Nigeria (Figure 1). Ibogun is one of the eleven political wards in Ifo LGA. (INEC, 2018). There are 32 communities in the village. They include Olaogun, Adina, Akiode, Sulola, Ekundayo, Akinside, Olaoparun, Opo, Alasia, Odeyinlo, Alapako Oke, Alapako Isale, Odeyemi, Alapoti, Egbeda, Fasina, Osungboye, Ilugboro, Omitoro, Balogun, Sowunmi, Igbogun, Awe Nla, Awe Kekere, Awe Alapapo, Fayelu, Abudu, Giwa, Olorundada, Ojodu, Abudu Tuntun, and Epoto. These communities are congruent and inseparable because they are closely knit together.

Ibogun community has a moderate population. Like every Nigerian rural settlement, it lacks basic modern infrastructure and facilities. It is, however, a predominantly agrarian community. Besides the cultivation of crops such as vegetables, it also engages in animal husbandry. Some of the animals being raised are poultry, piggery, and fishery. In terms of economy, the community produces a relatively high yield of cassava every year. The yields are sufficient for processing and constitute a significant source of income to some of the residents. In terms of physical development, the Ibogun community is predominantly residential with land-use supporting subsistence agriculture. However, some modern elements like schools, health centres, police posts, and markets exist in Ibogun. Most of the businesses are small-scale with a higher number of petty traders. Residential (housing) developments spring up from time to time due to the area's proximity to some medium-sized urban areas in the local government and state, including Ifo, Ota, Abeokuta, Ilaro, and Lagos.

Figure 1. Map of the study area




Source: Odufuwa et al. (2018)

Ifo LGA, where the Ibogun community is situated, is one of the Development Pressure Area as depicted by the Ogun State Regional Plan (Ogun State Government, 2008). This means that Ibogun has been identified as one of the places that should enjoy accelerated government presence. Perhaps it is to this effect that the government's College of

Engineering and Environmental Studies in the state-owned university (Olabisi Onabanjo University) is located in Ibogun. A natural implication of the location is the addition to the demographic population of the village by the institution. Furthermore, the community benefits from being closer to border settlements along the western part of Ogun. Among the borders is Nigeria's external border with the Republic of Benin, which conferred some advantages as trade routes for some of its agricultural products. The community's proximity to the international border is, however, also a crucial factor in this study as the point cannot be ignored that it had an inherent risk of being affected by COVID-19 from cross-border transmission.

The dominant means of movement and transportation in the Ibogun community is commercial motorcycle. Commercial motorcycles usually carry two or three passengers at a time. In other words, the people's means of transportation exposes them to COVID-19. In any case, part of the lockdown restrictions was the ban of movement, including of commercial motorcycles. It is a massive loss of daily revenue for these riders. The persons who bear the brunt are the wives at home who must now survive to meet the family's needs, particularly for daily feeding.

## Methodology

The study's methodology is based on the use of primary data. The primary data are derived from designed and pre-tested questionnaires administered on the target respondents – rural women – in the study area at Ibogun in a survey that lasted for five days. Apart from basic questions, the questionnaires also captured the respondents' socio-economic characteristics, their perceptions of the coronavirus pandemic, and the level of their awareness concerning lockdown measures and compliance. The majority of the questions posed in the questionnaire were closed-ended. This ensures that responses were specific and allowed for comparison of results (Schuman & Presser 1981, as cited in Krosnick & Presser, 2009). Apart from utilizing a purposive sampling technique, research assistants who were earlier briefed about the study, its objectives, and other expectations were used in administering the questionnaires. For ease of communication, the researcher employed only those with knowledge of the respondents' local dialect and could speak pidgin English. Of the total number of 85 questionnaires, 77 were returned and found usable. The resulting data were analysed using the Statistical Package for Social Sciences (IBM SPSS Statistics 25), while the results employed frequency distribution and other statistical descriptive methods to present findings. The income variable was analysed in categories.

## Hypotheses Testing

An inferential statistic involving Kendall's tau-b Correlation Tests was conducted to examine association or relationship between socioeconomic variables and independent

variables. For this study, two hypotheses were formulated and tested to determine an association or relationship between socioeconomic variables (educational level and monthly income) and independent variable (rating of compliance with coronavirus pandemic and lockdown measures). The two hypotheses are as stated hereafter:

i. $H_o$: There is no significant association or relationship between the monthly income of rural women and their compliance with coronavirus pandemic and lockdown measures

ii. $H_o$: There is no significant association or relationship between the educational level of rural women and their compliance with coronavirus pandemic and lockdown measures

## Results and Discussion

### Socioeconomic Characteristics of Respondents

Table 1 presents the results of the respondents' socio-economic characteristics. The marital status indicates that the majority, 57 (74%), of women are married, 4 or 5.2% are widowed, a mere two or 2. 6% are divorced while 9 or 11.7% are single. The majority of respondents, 11 (42%), fall within the age bracket of 31 and 40 years. Concerning educational attainment, only 7 or 9.1% of the respondents are illiterate. Interestingly, above one-third, 27 or (35.1%) of the respondents had tertiary education. This is of no surprise because the study area is situated in south-western Nigeria that is regarded as the most educated geopolitical zone in Nigeria, coupled with the advantage of a University campus employing women in the study area.

Also, data collected and analysed revealed that 93.6% of the respondents are gainfully employed, although a greater proportion (65%) are self-employed involving in farming, trading and artisanship.

Over half (51.9%) of the respondents earned below the new minimum wage of ₦30, 000 monthly in Nigeria. The proportion of those who earned between ₦30, 000 and ₦40, 000 are 24.7%, ₦40, 001 to ₦50, 000 (2.6%), and above ₦50, 000 (10.4%). It is noteworthy that the exchange rate of the United States Dollar US$1 to Nigeria Naira (₦) at the time of the study was ₦360 per US dollar

Fifty-eight (75.3%) of the respondents belong to households with less than seven people, while respondents with large households of between 7 and 12 in size are 13 (16.9%). The ethnic distribution indicated a higher proportion of Yoruba people. They dominated with 66 or 85.7% in line with the study being predominantly Yoruba. The results on religion

showed 61 (79.2%) as Christians; 15 (19.5%) Muslims; while traditional worshippers constituted 1 (1.3%).

The majority (55.8%) of the respondents had lived in the study area for less than ten years, 33% between 1 and 20 years, and 5.2% for above 30 years. The latter category includes those who have been residents of the study area since birth.

More details about the socio-economic attributes of rural women in the Ibogun community are presented in Table 1.

Table 1: Socioeconomic characteristics of respondents

| Variable | Frequency | Percent | Variable | Frequency | Percent |
|---|---|---|---|---|---|
| **Marital status** | | | **Age** | | |
| Single | 9 | 11.7 | 21 - 30 Years | 11 | 14.3 |
| Married | 57 | 74.0 | 31 - 40 Years | 32 | 41.6 |
| Widow | 4 | 5.2 | 41 - 50 Years | 21 | 27.3 |
| Divorced | 2 | 2.6 | Above 50 Years | 10 | 13.0 |
| No response | 5 | 6.5 | No response | 3 | 3.9 |
| *Total* | *77* | *100.0* | *Total* | *77* | *100.0* |
| **Level of education** | | | **Tribe** | | |
| Primary | 13 | 16.9 | Yoruba | 66 | 85.7 |
| Secondary | 30 | 39.0 | Igbo | 6 | 7.8 |
| Tertiary | 27 | 35.1 | Egun | 4 | 5.2 |
| No Education | 7 | 9.1 | Igede | 1 | 1.3 |
| *Total* | *77* | *100.0* | *Total* | *77* | *100.0* |
| **Occupational status** | | | **Monthly income** | | |
| Farmer | 9 | 11.7 | Below ₦30,000 | 40 | 51.9 |
| Artisan | 9 | 11.7 | ₦30,000 - ₦40,000 | 19 | 24.7 |
| Trader | 32 | 41.6 | ₦40, 001 - ₦50,000 | 2 | 2.6 |
| Public/Civil Servant | 15 | 19.5 | Above ₦50,000 | 8 | 10.4 |
| Private Employee | 7 | 9.1 | No response | 8 | 10.4 |
| Unemployed | 2 | 2.6 | *Total* | *77* | *100.0* |
| No response | 3 | 3.9 | **Household size** | | |
| *Total* | *77* | *100.0* | 0 - 6 | 58 | 75.3 |
| **Period of residency** | | | 7 - 12 | 13 | 16.9 |
| Less than 10years | 43 | 55.8 | No response | 6 | 7.8 |
| 11years - 20years | 26 | 33.8 | *Total* | *77* | *100.0* |
| 21years - 30years | 1 | 1.3 | **Religion** | | |
| 41years - 50years | 1 | 1.3 | Christianity | 61 | 79.2 |
| Above 50years | 2 | 2.6 | Islam | 15 | 19.5 |
| No response | 4 | 5.2 | Traditional belief | 1 | 1.3 |
| *Total* | *77* | *100.0* | *Total* | *77* | *100.0* |

Source: Authors' Field Survey (2020)

**Awareness of Coronavirus Pandemic**

The awareness level about the coronavirus pandemic was sought from the respondents. Table 2 indicated that 92.2% of the respondents were aware. The respondents became aware of the coronavirus pandemic through media such as television, radio, friends, neighbours, government, relatives, and village heads. But a greater proportion of the respondents had their awareness through television (n=39 or 37.9%) and radio (n=34 or 33.0%). This proved significantly the role played by the media in deepening awareness about the pandemic. The peak of the majority (59.7%) becoming informed about the virus was in March 2020. The gradual rise began at 5.2% in December 2019, 13.0% in January 2020, 11.7% in February 2020, and getting to the peak with 10.4% in April 2020. Perhaps, because the first case of coronavirus infection was reported in Ogun State on February 27, 2020, the awareness peak was reached a few weeks later in March 2020.

Again, results showed that there had been no reported case of coronavirus in the study area despite the first reported case of the pandemic in Nigeria being close to the study area. Ogun State has, however, had its fair chance of recorded coronavirus cases after the index case. However, respondents had full knowledge of symptoms associated with the coronavirus infection. The symptoms they identified included coughing and sneezing, as affirmed by 46 (28.6%) each of both counts. The other symptoms were fever (n= 36 or 22.4%) and difficulty in breathing (n= 33 or 20.5%). See Table 2.

**Table 2: Awareness of coronavirus pandemic**

| Variable | Category | Frequency | Percent |
|---|---|---|---|
| Coronavirus Awareness | Yes | 71 | 92.2 |
| | No | 6 | 7.8 |
| | *Total* | *77* | *100.0* |
| Medium of awareness | Friend | 11 | 10.7 |
| | Radio | 34 | 33.0 |
| | Neighbour | 9 | 8.7 |
| | Television | 39 | 37.9 |
| | Relatives | 3 | 2.9 |
| | Village Head | 2 | 1.9 |
| | Government | 5 | 4.9 |
| | *Total* | *103** | *100.0* |
| Date of awareness | December 2019 | 4 | 5.2 |
| | January 2020 | 10 | 13.0 |
| | February 2020 | 9 | 11.7 |
| | March 2020 | 46 | 59.7 |
| | April 2020 | 8 | 10.4 |
| | *Total* | *77* | *100.0* |
| Case of coronavirus in your community | Yes | 0 | 0 |
| | No | 76 | 98.7 |
| | No response | 1 | 1.3 |
| | *Total* | *77* | *100.0* |
| Symptoms of coronavirus | Fever | 36 | 22.4 |
| | Cough | 46 | 28.6 |
| | Difficulty in breathing | 33 | 20.5 |
| | Sneezing | 46 | 28.6 |
| | *Total* | *161** | *100.0* |

*Total exceeded the number of a questionnaire administered due to respondents' multiple responses
Source: Authors' Field Survey (2020)

**Lockdown Awareness and Compliance**

From Table 3, the result revealed that 93.5% are aware of the lockdown in Ogun State, where the study area is situated. And to what extent is the compliance of the populace with the lockdown? A total of (34) or 44.2% of the respondents rated the compliance to be 'very good.' 22 or 28% judged it 'good' 'good' compared to 20.8% who believed it was 'fair.' A negligible 5 or 6.5% were indifferent. Was the heavy compliance related to the presence of the Task Force in the study area? Fifty-two respondents, or 67.5%, thought so.

Despite the lockdown's seeming success, 55 or 71.4% of the respondents say they will not support any further lockdown even if the coronavirus pandemic persists. Sixteen or 20.8%, however, said they would still support lockdowns. The anti-lockdown respondents cited the disruption of their economic livelihood as the reason. This position, explained by

Mboera et al. (2020), could be linked to the inability of countries in sub-Saharan Africa to provide palliatives for their vulnerable populations.

Table 3: Awareness of lockdown and compliance

| Variable | Category | Frequency | Percent |
|---|---|---|---|
| Awareness of lockdown in Ogun State | Yes | 72 | 93.5 |
| | No | 1 | 1.3 |
| | No response | 4 | 5.2 |
| | Total | 77 | 100.0 |
| Rating of lockdown compliance | Very good | 34 | 44.2 |
| | Good | 22 | 28.6 |
| | Fair | 16 | 20.8 |
| | No response | 5 | 6.5 |
| | Total | 77 | 100.0 |
| Presence of Task Force enforcing compliance with lockdown | Yes | 52 | 67.5 |
| | No | 20 | 26.0 |
| | No response | 5 | 6.5 |
| | Total | 77 | 100.0 |
| Any visitor during this lockdown | Yes | 8 | 10.4 |
| | No | 67 | 87.0 |
| | No response | 2 | 2.6 |
| | Total | 77 | 100.0 |
| Did you visit anywhere outside this community during the lockdown? | Yes | 11 | 14.3 |
| | No | 65 | 84.4 |
| | No response | 1 | 1.3 |
| | Total | 77 | 100.0 |
| Support for lockdown if coronavirus pandemic persists | Yes | 16 | 20.8 |
| | No | 55 | 71.4 |
| | No response | 6 | 7.8 |
| | Total | 77 | 100.0 |

Source: Authors' Field Survey (2020)

**Coronavirus Pandemic Measures Compliance Rating**

Respondents were asked to evaluate themselves on the adherence to various measures and directives put in place to curtail the spread of coronavirus. The results in Table 4 revealed how respondents faired in taking responsibilities. Results revealed that 57.1% of the respondents believed they performed well when it comes to adherence to the directive of not congregating at a place of worship. Other aspects of lockdowns and restriction measures where the majority of respondents rated themselves as 'very good' include "the staying at home during lockdown" (49.4%), "avoid gatherings and physical contact" (46.8%), and "regular handwashing with soap under running water" (46.8%). Conversely, the respondents opined they did poorly concerning the "use of hand sanitizer" (20.8%), "going out on relaxation window only" (11.7%), and "avoid touching your face" (10.4%).

Table 4: Compliance with coronavirus pandemic and lockdown measures

| Items | Very good | Good | Fair | Poor | Total |
|---|---|---|---|---|---|
| Regular hand-washing with soap under running water | 46.8 | 32.5 | 19.5 | 1.3 | 100 |
| Avoid touching your face | 24.7 | 32.5 | 32.5 | 10.4 | 100 |
| Use of face mask | 37.7 | 42.9 | 11.7 | 7.8 | 100 |
| Maintaining social distancing | 36.4 | 37.7 | 20.8 | 5.2 | 100 |
| Staying at home during lockdown | 49.4 | 39.0 | 7.8 | 3.9 | 100 |
| Avoid gatherings & physical contact | 46.8 | 37.7 | 10.4 | 5.2 | 100 |
| Not going to place of worship | 57.1 | 27.3 | 9.1 | 6.5 | 100 |
| Going out on the relaxation window only | 31.2 | 35.1 | 22.1 | 11.7 | 100 |
| Use of hand sanitizer | 29.9 | 29.9 | 19.5 | 20.8 | 100 |

Source: Authors' Field Survey (2020)

**How convenient is the Lockdown to women?**

This is one of the central focus of the study. How were the women able to meet their domestic responsibilities during the lockdown? Over half of the respondents stated that domestic activities were either 'fairly convenient' or 'not convenient' as a result of the lockdown (Table 5).

Table 5: Coping with domestic responsibilities

| Items | Very Convenient | Convenient | Fairly convenient | Not convenient | Not Applicable* | Total |
|---|---|---|---|---|---|---|
| Fetching of water | 27.3 | 39.0 | 15.6 | 18.2 | - | 100 |
| Fetching of firewood | 11.7 | 26.0 | 18.2 | 31.2 | 13.0 | 100 |
| Food from farm | 11.7 | 24.7 | 20.8 | 32.5 | 10.4 | 100 |
| Cooking for the family | 20.8 | 27.3 | 28.6 | 23.4 | - | 100 |
| Taking care of family | 24.7 | 20.8 | 32.5 | 22.1 | - | 100 |

Note: *This concerns those who neither use firewood nor take food from farm
Source: Authors' Field Survey (2020)

**Palliatives during Lockdown**

Respondents also commented on their access to palliatives during the lockdown, as shown in Table 6. The majority (n= 29 or 31.2%) received food as a palliative, 13 or 14.0% received money, 7 or 7.5% were given sanitizer, and 3.2% received face mask. Results obtained revealed access to palliatives were not impressive, considering the majority of the respondents earned below ₦30 000 monthly (the minimum wage in Nigeria). The information gathered also showed that a greater percentage (n=18 or 18.8%) confirmed the church as the palliatives' main donor. Other donors of significance are relatives (n=11 or 11.5%) and friends (n=10 or 10.4%). Despite publicity by the government, especially at

the state and federal levels regarding efforts in the provision of palliatives to the populace, marginal proportions (n=5 or 5.2% and n=2 or 2.1%) of the respondents were beneficiaries of palliatives from the state and federal governments, respectively. The results suggest the distribution methods adopted by the governments may be faulty or perhaps the palliatives are insufficient to cater for the projected population.

Table 6: Palliative during the lockdown

| Variable | Category | Frequency | Percent |
|---|---|---|---|
| Palliative received during the lockdown in your community | Money | 13 | 14.0 |
| | Food | 29 | 31.2 |
| | Sanitizer | 7 | 7.5 |
| | Face mask | 3 | 3.2 |
| | Not applicable | 41 | 44.1 |
| | Total | *93** | *100.0* |
| Donors of palliative in your community | Friend | 10 | 10.4 |
| | Relative | 11 | 11.5 |
| | Local Government | 8 | 8.3 |
| | State Government | 5 | 5.2 |
| | Federal Government | 2 | 2.1 |
| | Mosque | 3 | 3.1 |
| | Church | 18 | 18.8 |
| | Non-governmental organisation | 7 | 7.3 |
| | Not applicable | 32 | 33.3 |
| | Total | *96** | *100.0* |

*Total exceeded the number of a questionnaire administered due to respondents' multiple responses
Source: Authors' Field Survey (2020)

**Impacts of Coronavirus Pandemic and Lockdown Measures**

The study established that the impacts of the deployed coronavirus pandemic and lockdown measures were both positive and negative. The greatest was low business patronage for respondents' negative impacts (n= 42 or 28.6%). Others that are of significance were being victim of robbery (n=28 or 19.1%), personal relationship with God (n=25 or 17.0%), job loss (n=17 or 11.6%), spending less time with friends (n= 14 or 9.5%), and damage to farm produce (n=8 or 5.4%). The remaining proportion (n=9 or 6.1%) accounted for those who suffered hunger, non-payment of salary, and loss of loved ones who could not access healthcare services for fear of being diagnosed for COVID-19 disease. The results confirm FAO's (2020) and CARE's (2020) positions on the impacts of COVID-19 on rural communities, especially women. Despite the negative impacts, respondents have also perceived the pandemic and lockdown measures from a positive angle. A larger proportion (n=41 or 34.8%) of the respondents opined that lockdown allowed them to spend more time with their family, 33 or 28.0% learned to prepare for sudden happenings, 22 or 18.6% learned to cope with available resources, 12 or 10.2% believed it opened new business opportunities and marginal proportion (n=5 or 4.2%) experienced growth in their

businesses. Other positive impacts include safety from infections and the privilege to share possession with people (Table 7).

Table 7: Impacts of coronavirus and lockdown measures

| Variable | Category | Frequency* | Percent |
|---|---|---|---|
| Negative impacts | Damage to farm produce | 8 | 5.4 |
| | Low business patronage | 42 | 28.6 |
| | Job loss | 17 | 11.6 |
| | Victim of robbery | 28 | 19.1 |
| | Spend less time with friends | 14 | 9.5 |
| | The personal relationship with God | 25 | 17.0 |
| | Others | 9 | 6.1 |
| | No response | 4 | 2.7 |
| | Total | *147** | *100.0* |
| Positive impacts | More time with my family | 41 | 34.8 |
| | Engagement in new business | 12 | 10.2 |
| | I learn to prepare for a sudden happening | 33 | 28.0 |
| | Growth in business | 5 | 4.2 |
| | I learn to cope with available resources | 22 | 18.6 |
| | Others | 5 | 4.2 |
| | Total | *118** | *100.0* |

*Total exceeded the number of a questionnaire administered due to respondents' multiple responses
Source: Authors' Field Survey (2020)

## Hypothesis Testing

### Test I

$H_o$: There is no significant association or relationship between the educational level of rural women and their compliance with coronavirus pandemic and lockdown measures

Table 8 presents the observed statistical relationship between the distribution of a categorical variable (educational level) with the distribution in another independent group of variables (compliance with coronavirus pandemic and lockdown measures) through Kendall's use's Tau-b Correlation Test. The test was run to determine if there is an association or relationship between the categorical variable and groups of independent variables.

The results of Kendall's Tau-b Correlation Test from Table 8 revealed little or no correlation between educational level and compliance with coronavirus pandemic and lockdown measures. These measures are regular hand-washing with soap under running water [$\tau_b$ = -.093], avoid touching your face [$\tau_b$ = .037], use of face mask [$\tau_b$ = -.094], maintaining social distance [$\tau_b$ = -.008], staying at home during lockdown [$\tau_b$ = -.180], avoid gathering and

physical contact [$\tau_b$ = -.066], not going to place of worship [$\tau_b$ = -.149], going out on relaxation window only [$\tau_b$ = -.012], and use of hand sanitizer [$\tau_b$ = -.030]. Additionally, all the independent variables have a p-value greater than 0.05. This result implies that we accept the null hypothesis ($H_0$) that states that no significant association or relationship between rural women's educational level and compliance with coronavirus pandemic and lockdown measures.

Table 8: Summary of Kendall's tau-b Correlation Test between Educational Level and Compliance with Coronavirus Pandemic and Lockdown Measures

| **Items** | **Educational Level** | |
|---|---|---|
| Regular hand-washing with soap under running water | Correlation Coefficient | -.093 |
| | Sig. (2-tailed) | .356 |
| | N | 77 |
| Avoid touching your face | Correlation Coefficient | .037 |
| | Sig. (2-tailed) | .704 |
| | N | 77 |
| Use of facemask | Correlation Coefficient | -.094 |
| | Sig. (2-tailed) | .348 |
| | N | 77 |
| Maintaining social distance | Correlation Coefficient | -.008 |
| | Sig. (2-tailed) | .933 |
| | N | 77 |
| Staying at home during the lockdown | Correlation Coefficient | -.180 |
| | Sig. (2-tailed) | .078 |
| | N | 77 |
| Avoid gathering & physical contact | Correlation Coefficient | -.066 |
| | Sig. (2-tailed) | .512 |
| | N | 77 |
| Not going to place of worship | Correlation Coefficient | -.149 |
| | Sig. (2-tailed) | .142 |
| | N | 77 |
| Going out on the relaxation window only | Correlation Coefficient | -.012 |
| | Sig. (2-tailed) | .907 |
| | N | 77 |
| Use of hand sanitizer | Correlation Coefficient | -.030 |
| | Sig. (2-tailed) | .757 |
| | N | 77 |

**Test II**

Ho: There is no significant association or relationship between the monthly income of rural women and their compliance with coronavirus pandemic and lockdown measures

Table 9 presents the observed statistical relationship between the distribution of a categorical variable (monthly income) with the distribution in another independent group of variables (compliance with coronavirus pandemic and lockdown measures) through Kendall's use's Tau-b Correlation Test. The test was run to determine if there is an association or relationship between the categorical variable and groups of independent variables.

The results of Kendall's Tau-b Correlation Test from Table 9 revealed that there is little or no correlation between monthly income and the independent variables of regular hand-washing with soap under running water [$\tau_b$ = -.031], avoid touching your face [$\tau_b$ = -.083], not going to place of worship [$\tau_b$ = -.156], going out on relaxation window only [$\tau_b$ = -.148], and use of hand sanitizer [$\tau_b$ = .013]. However, there were low, negative correlations between monthly income and independent variables (use of face mask [$\tau_b$ = -.239$^{*}$, p = .027], maintaining social distance [$\tau_b$ = -.308$^{**}$, p = .004], staying at home during lockdown [$\tau_b$ = -.232$^{*}$, p = .035]), and avoid gathering and physical contact [$\tau_b$ = -.253$^{*}$, p =.020]) (Table 9), which were statistically significant. Based on this result, it can be concluded that monthly income statistically has an association or relationship with the coronavirus pandemic and response to lockdown measures.

Table 9: Summary of Kendall's tau-b Correlation Test between Monthly Income and Compliance with Coronavirus Pandemic and Lockdown Measures

| **Items** | **Monthly Income** | |
|---|---|---|
| Regular hand-washing with soap under running water | Correlation Coefficient | -.031 |
| | Sig. (2-tailed) | .777 |
| | N | 69 |
| Avoid touching your face | Correlation Coefficient | -.083 |
| | Sig. (2-tailed) | .435 |
| | N | 69 |
| Use of facemask | Correlation Coefficient | -.239$^{*}$ |
| | Sig. (2-tailed) | .027 |
| | N | 69 |
| Maintaining social distance | Correlation Coefficient | -.308$^{**}$ |
| | Sig. (2-tailed) | .004 |
| | N | 69 |
| Staying at home during lockdown | Correlation Coefficient | -.232$^{*}$ |
| | Sig. (2-tailed) | .035 |
| | N | 69 |
| Avoid gathering & physical contact | Correlation Coefficient | -.253$^{*}$ |
| | Sig. (2-tailed) | .020 |
| | N | 69 |
| Not going to place of worship | Correlation Coefficient | -.156 |

| | | |
|---|---|---|
| | Sig. (2-tailed) | .154 |
| | N | 69 |
| Going out on the relaxation window only | Correlation Coefficient | -.148 |
| | Sig. (2-tailed) | .166 |
| | N | 69 |
| Use of hand sanitizer | Correlation Coefficient | .013 |
| | Sig. (2-tailed) | .899 |
| | N | 69 |

*. Correlation is significant at the 0.05 level (2-tailed).

**. Correlation is significant at the 0.01 level (2-tailed).

## Policy and Planning Implications

Deducible from this study is the observed presence of policy and planning implications for understanding and responding to pandemic consequences of this nature. The coronavirus pandemic was unexpected, sudden, and unprepared for, therefore, generating panic and fear in all strata of society. The pandemic's global dimension is again unique as against other known pandemics that were localized and regional in context. Hence, it is obvious that the government and other stakeholders need to be exposed to the emergency response of this nature and ensure that general awareness and public enlightenment are created to manage future occurrences with ease. The policy implication is for the government to establish future guidelines, regulations, and legislation over administration, implementation and managing of future pandemics, and establish structures capable of providing overall coverage and reach to its people. Planning measures capable of enhancing the good intentions and attributes associated with pandemic management should be put in place. This is to suggest a proactive approach rather than a reactive method. Through the provision of administrative, legal and institutional structures, a future pandemic could be successfully managed and mitigated. The essence of developing a policy and planning response to a pandemic of this nature is to guide against the general application of an ad hoc response, uncoordinated approach, and panic response.

## Conclusion and Recommendations

This study established that the rural women of Ibogun community have been able to adjust and adapt to the mitigation rules, regulations, and directives of government towards guiding against the spread of the COVID-19 pandemic. This study further showed that there had been no occurrence of risk and exposure to the COVID-19 disease in the Ibogun community. This is due to the strong adherence of the Ibogun community to the mitigating rules guiding the COVID-19 pandemic in the city. Besides, it is noted that government's presence in terms of providing supportive items or access to those items was problematic, although they were able to ensure compliance. Furthermore, the lockdown, social

distancing, and use of facemask were difficult for women in the community to adhere strictly to as revealed by the study. For the risk associated with the pandemic, the rural women of the study area maintained no movement outside the community to guard against exposure. The inferential analysis revealed a significant relationship between rural women's income and compliance with coronavirus pandemic and lockdown measures. However, there is no meaningful relationship between rural women's educational level and compliance with coronavirus pandemic and lockdown measures.

From the above, the following recommendations are proposed.

i. Government should put up an administrative structure for future management of pandemic occurrences
ii. Globally, the pandemic is known to be sudden and unexpected, therefore the government should train people with mitigation knowledge, public enlightenment and public education for the future management and administration of future pandemic occurrence
iii. The government should ensure legislation, policy, and planning guiding pandemic are enacted. For instance, there is a need to put in place legislation for Disaster Response and Management for pandemic as well as capacity development for frontline respondents
iv. Health facilities within the community should be improved as well as the strategic provision of isolation centers as it is currently absent
v. The government at all levels (federal, state, and local) should ensure that palliatives are provided to the rural community, especially the women who are the most vulnerable in the event of any pandemic occurrences such as the coronavirus pandemic. It is also important to ensure that the palliatives get to the target people
vi. The government should see to the provision of an enabling environment for the women to be empowered through programmes that would enhance their capacity to adjust and adapt to future pandemics. For instance, efforts need to be geared towards educating them on how to respond to employment opportunities. Alternative employment opportunities during crisis prepare rural women against unforeseen circumstance;
vii. There is a need for the government at all levels (federal, state, and local) to collaborate with CDAs, community leaders, especially *Obas*, and faith-based organisations in the management of future occurrences, especially as it concerns creating awareness, enforcement and distribution of palliatives;
viii. The government should establish infectious disease centres in all local governments in Nigeria, and
ix. Pharmaceutical companies and medical equipment companies should fund Research Institutes in Nigeria in the areas of test kits, ventilators and other laboratory equipment.

It is believed that the recommendations provided have a short, medium and long-term policy and planning implications. We believe that when these recommendations are taken into consideration, the future occurrence of any pandemic of this nature will be better mitigated and managed.

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