

# Management Practices and Performance of Pension Scheme In Informal Sector a Case of Rwanda Social Security Board

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**Abstract: Background:** In many countries, social security accounts for a larger fraction of the government budget, given that at any point in time, the number of recipients of social security benefits is smaller than the contributors. In the overlapping generations model studied in several research showed that all individuals currently alive vote on social security in every period, in equilibrium, the size of social security is larger, the greater is the proportion of elderly people in the population. Informal sector workers are too concerned with social security schemes. The general objective was to examine the effect of management practices on the performance of pension scheme in informal sector in Rwanda. The specific objectives were to examine the effect of social security mobilization on the performance of pension scheme in informal sector in Rwanda; to determine the effect of the use of ICT on the performance of the pension scheme in informal sector and to assess the effect of feedback on the performance of pension scheme in informal sector in Rwanda.

**Methods and Materials:** The study utilized descriptive and regression analysis to measure the stud variables. The target population of 100 people and the census method was used since the target population small. Both primary and secondary data were used. Structured questionnaire was used to collect primary data while documentary review was used for secondary data. SPSS software version 25 was used in data analysis.

**Results:** The findings showed that 50 respondents out of 100 or the half of respondents strongly agree that mobilization campaigns related to social security made by RSSB needs to be strengthened in informal sector. The findings further showed that out of 100 respondents, 38 representing 38% responded that they were strongly agree that is fair that RSSB uses SMS on regular basis to notify both employers and employees in informal sector on personal social security status. In addition, 65 out of 100 respondents or 65% strongly agree that people assisted by the Government are reduced in case pension benefits payment is offered to the former employees in informal sector. The Pearson correlation analysis showed that mobilization of contribution ( $r=0.874$ ,  $p=0.003$ ), the use of ICT ( $r=0.703$ ,  $p=0.002$ ) and the feedback system ( $r=0.658$ ,  $p=0.000$ ) are all positively and significantly related to the performance of pension scheme in the informal sector. The  $R^2=0.611$  showed that 61.1% of the performance of pension schemes in the informal sector in Rwanda can be explained by the management practices such as contribution mobilization, use of ICT and feedback systems in the pension plans.

**Conclusion:** Theresearcher recommends that RSSB management is advised to take appropriate corrective action as a matter of priority to increase the pension scheme in the informal sector in Rwanda. They can do this by carrying out public awareness campaigns that can be used to mobilize pension contribution among the workers in the informal sector. Best management practices such as conducting mobilization campaigns, use of ICT and feedback systems can help in increasing the performance of pension schemes in the informal sector.

**Keywords:** Management Practices, Performance of Pension scheme, Informal Sector, Rwanda Social Security Board.

## I. Introduction

Throughout the course of human history, individuals have encountered various sources of uncertainty, ranging from illnesses and disabilities to the realities of aging, mortality, and unemployment. These inherent facets of existence are commonly perceived as threats to economic security within the realm of economics. In ancient Greek society, for instance, the presence of amphorae filled with olive oil symbolized a form of economic stability. Given its nourishing

properties and extended shelf life, olive oil was held in reserves by the Greeks as a safeguard for their financial well-being in times of need (Saritha, 2022).

The feudal lord held the responsibility of ensuring the serfs' financial well-being while they worked on the estate, and the feudal system served as the foundation of economic stability in medieval Europe. As long as there was a constant supply of serfs to provide labor on the estate, the feudal lord would enjoy financial security. During the Middle Ages, the concept of charity began to take shape as a formal economic arrangement. Consequently, family members and relatives have since felt a sense of obligation towards one another. In cases where the family possessed wealth, this often served as a source of financial security, particularly for the elderly or sick (Saritha, 2022).

In line with Fry and Braga's (2023) findings, it was customary for a man to pass on physically demanding work to his son when he reached an advanced age and transitioned into a more relaxed profession. During the 1950s in Africa, a significant proportion of elderly men, approximately 77%, remained active in the workforce (Fry & Braga, 2023). This prevailing work ethic in Africa at the time stemmed from societal expectations and the belief that abstaining from work was socially unacceptable. Notably, the majority of these individuals were engaged in agricultural activities. When machines were introduced, it became evident that older workers lacked the physical strength and speed required to operate the machinery efficiently, thus impeding the pace of production. Consequently, there was a noticeable shift in attitudes towards elderly individuals, with a more pessimistic outlook prevailing. Numerous business owners experienced unease regarding the prospect of releasing dedicated older employees, which would render them jobless and devoid of any source of income (Konig, et al., 2018).

In Mauritius, The Basic Old Age Pension targets citizens of Mauritius aged 60 years and over who have resided in Mauritius for a combined period of 12 years after the age of 18; however, the scheme is available to all Mauritians after the age of 70 regardless of residency (Mansor, Awang & Rashid, 2022). In East Africa, Kenya has four different types of pension programs: the NSSF, for private sector workers; the Civil Service Pension Program, for government workers; employer-provided occupational pensions, for private sector workers; and individual pension programs, for private sector workers (Atandi & Bosire, 2023).

In Tanzania, all the social security schemes are regulated and supervised by SSRA. Benefits offered by the schemes include; medical care, invalidity, maternity, education, death, old age and survivors. According to Section 30 of SSRA Act, every new employee has a right to choose any one of the mandatory schemes he/she prefers (Padala, 2020).

According to Zotova (2022), management practices were suggested and implemented all over the world to improve social security in formal sector or formal environment; but nowadays, a significant number of workers are in informal sector, and are not protected socially, due to lack of social security education among their employers. In Rwanda, to administer social security, the government established the Rwanda Social Security Board (Rwanda Social Security Board, 2020), after merging, the SSFR with RAMA and it becomes the first public institution of social security. The Rwandan pension program aims to provide support to both the surviving family members of deceased workers and workers who are unable to work due to old age, disability, or inability to support themselves.

Consequently, the Social Security benefits offered by the pension branch are divided into two distinct categories: benefits provided to insured individuals upon reaching old age or experiencing disability, and benefits provided to their eligible heirs. It is imperative that all employees receiving a salary (irrespective of their nationality) and active political representatives adhere to the compulsory enrollment in pension benefits. The employer's contributions amount to 3%, whereas employee contributions amount to 3%. Furthermore, individuals have the option to become voluntary members by submitting an application to the program and making the necessary 6% contribution from their wages. In order to be eligible, voluntary members must be below the age of 45. It is important to note that individuals can only apply for voluntary insurance within the initial 12 months following the expiration of their mandatory insurance, provided they were previously enrolled (RSSB, 2020). The main objective of this study was to examine the effect of management practices on the performance of pension scheme in informal sector in Rwanda. It was guided by the following specific objectives:

- i. To determine the effect of mobilization of contributions on the performance of pension scheme in informal sector in Rwanda.
- ii. To determine the effect of the utilization of ICT on the performance of pension scheme in informal sector in Rwanda.
- iii. To assess the effect of feedback on the performance of pension scheme in informal sector in Rwanda.

## **II. Theoretical Framework**

The study is supported by three theories in relation with the content of the research such as:

### **Integrative Theory**

Given the scope and diversity of informal employment, an integrated conceptual framework that takes into account the causes and effects of all forms of informality – not just one or the other – is required, according to Esser and Kroneberg (2015). Following is an integrated set of causal explanations that encompasses the majority of forms of informality, paraphrasing the title of a recent World Bank report on informality that focused on two causal explanations known as Exit and Exclusion:

Some independent contractors choose to work informally to save money on registration and taxes. Others, including former employees who used to receive formal pay, consider the pros and cons of working for themselves in the informal sector. However, many informal laborers work in this manner out of necessity or tradition rather than a conscious choice (Oteng, et al., 2022). Many independent contractors would appreciate fewer barriers to registration and associated fees. They see formalization as a way to benefit from legally binding business contracts, access to capital, and market intelligence.

It is possible that the people in charge of creating policies and regulations have overlooked these workers due to carelessness, prejudice, or simply a lack of understanding. Furthermore, many informal business owners are either unaware of their rights as citizens if they choose to formalize their businesses, or they lack the means or the desire to expand and become official. Employers often choose to avoid paying payroll taxes, making employer contributions to social security or pensions, and fulfilling other duties as employers by maintaining a small core regular staff and hiring additional workers on an informal basis. In these cases, it is the employers who are avoiding taxes and regulations, not the employees. Similarly, some large businesses choose to collaborate with smaller businesses to provide goods and services without formal agreements or risk sharing.

This theory is selected because it is applicable to this study since it argues that there within an economy, exclusion can affect negatively a sector contribution and performance. It proposes the needed to integrate all forms of the sectors in to the economy to ensure inclusiveness and effectiveness in the economic system. In terms of pension schemes, the theory points to the need of bringing in the informal sector abode and to ensure effeteness in their registration and to influence their social welfare through these services.

### **Theory of Change**

Sri (2016) suggests that the theory of change explains how different social safety measures, both contributory and non-contributory, as well as informal work, interact with each other. The theory of change outlines the expected outcomes of a particular action. It involves identifying the key inputs and activities from social protection policies that affect labor market outcomes, including informal employment, through specific channels. These factors ultimately impact overall productivity, income and consumption stability, economic growth, and resilience against unexpected events throughout a person's life.

Sri (2016) points out those both formal and informal workers have seen improvements in their coverage and protection through contributory social insurance systems and non-contributory social assistance programs. Contributory social insurance schemes have introduced several initiatives such as helping workers enroll in social insurance, extending welfare benefits to workers' dependents, and providing premium subsidies for vulnerable groups and informal workers. Hence, this theory is relevant in this stud because it attempts to shed light on the impact that change can have on people. Particularly, promoting social protection schemes for the informal sector and to the poor will have a significant effect on their social and economic well-being. This especially so, if the pension schemes would work in the informal sector which tend to be excluded in many countries. In this case, the workers in this sector would experience socioeconomic change because of support at old age.

### **Lump of Labor Theory**

The lump of labor fallacy, according to Opoku and Hsu (2019), is the false notion that there is a constant quantity of work accessible in the economy and that, either way, increasing the number of workers reduces the amount of work available for everyone else. The continued high unemployment rates in Europe, together with the lenghtier average workweeks of many workers in the English-speaking countries, have rekindled interest in working time redistribution schemes.

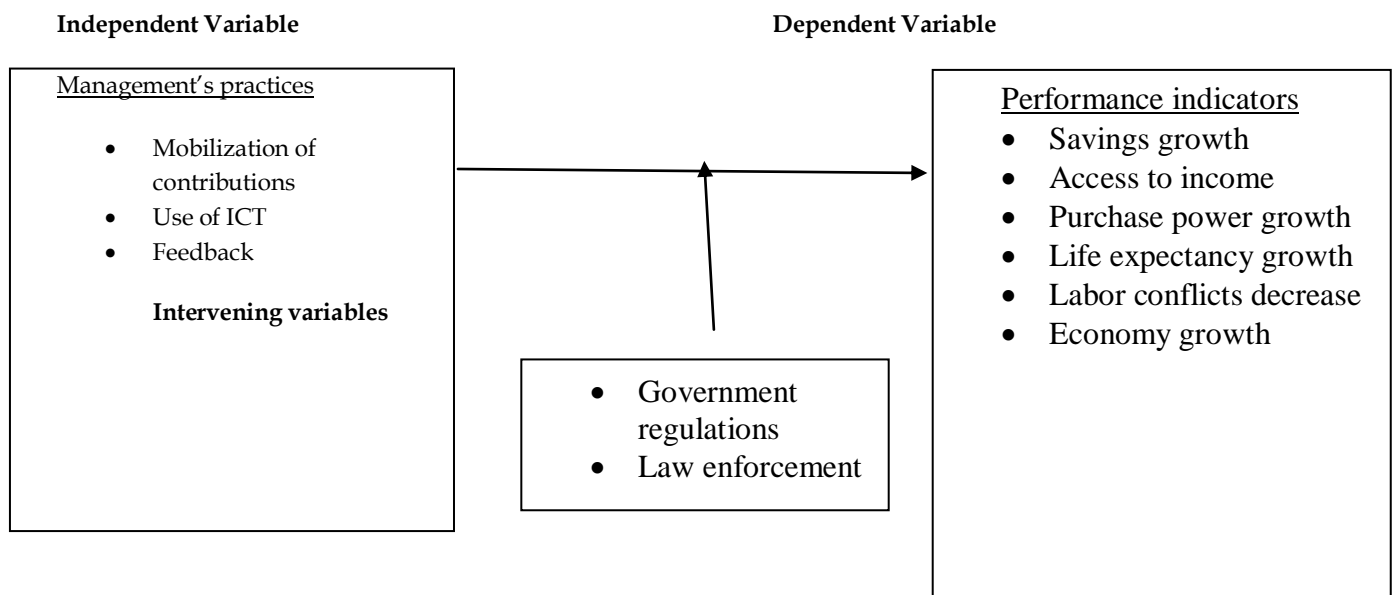
According to mainstream economists, the idea of spreading work hours through initiatives like work-sharing, which aim to increase employment, is based on the false assumption that there is a limited amount of work available. This belief is sometimes referred to as the "lump-of-labor fallacy," or the "lump-of-work" or "lump-of-output" fallacy. Despite proponents of shorter workweeks consistently denying the idea of a fixed amount of work for over a century, many in

the economics community have come to accept this criticism. The justifiable claim that the current work arrangements are not optimal and that a significant adjustment in the distribution of work is both desirable and feasible serves as the foundation for the advocacy of work-time redistribution as a cure for unemployment.

In relation to the social protection, the argument in terms of the lump of labor theory is that the increasing capacity of the workers should be compensated at the later ears of their lives. This imply that since the workers were productive at their youthful time, they should be compensated when they can no longer function to their maximum at old age. The theory therefore argues that the time the workers were productive should be compensated later through pension schemes (Oteng, et al., 2022). At the same time, it is important to recognize the contributions that the working force had during their active lives. At their old age, the informal sector workers should therefore be compensated using the pension scheme plans.

### III. Conceptual Framework

Figure 1: Conceptual Framework



Source: Researcher (2024)

The conceptual framework shown in Figure 2.1 is a schematic diagram, which illustrates the relationship between independent variable and dependent variable. The diagram shows how the presence of any one of the factors in management practices such as working methods, use of ICTs, management initiatives, feedback leads to performance of social security pension scheme. Other factors affect both dependent and independent variables like government regulations and law enforcement.

### IV. Research Methodology

#### Research Design

In this work, the researcher adopted descriptive and correlation research designs, which were both, based on a survey of selected respondents of RSSB and others from private sector federation on issue of management practices on maximization of social security schemes in informal sector.

#### Target Population

The entire number of items covered by the study questions was known as the population. Additionally, it was a group of examples from which a sample was taken in order to generalize the study. This study focused on 100 people composed of employers and employees in informal sector and staff of RSSB as target population. These numbers were provided by RSSB from their files of their clients in the informal sector (RSSB, 2023). The target population was subdivided into three categories as follows:

#### Sample Design

Sampling in research consists of selecting a part of the whole population, which should represent the characteristics of that population. These generalizations could take the shape of estimates of one or more population-associated traits, or they could focus on estimates of the degree to which certain qualities within the population are correlated.

**Sample Size**

The creation of a sampling frame is necessary for the selection of a sample from a specified target population. Usually, this takes the form of a tangible list of population components. A well-constructed sampling frame enables the researcher to capture the defined target population without having to worry about the listing being contaminated with incorrect entries or ones that represent associated with the excluded population, even though it may occasionally also consist of unusual listings. The sample size in this study was 100 respondents, which was equal to the target population. Since the target population was relatively small, there was no need of computing a sample size.

**Sampling Technique**

The researcher used census by considering the whole population of 100 people as sample size because the target population does not exceed 100.

**Table 1: Sample Size Distribution**

| Strata                    | Population | Sample Size | Sample Procedure |
|---------------------------|------------|-------------|------------------|
| RSSB staff                | 20         | 20          | census           |
| Informal sector Employers | 30         | 30          | census           |
| Informal sector Employees | 50         | 50          | Census           |
| <b>Total</b>              | <b>100</b> | <b>100</b>  |                  |

Source: Researcher compilation (2023)

**Data Collection Methods**

Primary and secondary data were collected. Primary data was collected using questionnaire. The design of the questionnaire was based on management practices on social security schemes. Secondary data was collected from diverse sources of documents and/or electronically stored information related to the study and concerning the project.

**Data Collection Instruments**

In this study, the main instruments that were used to generate data and opinion were the questionnaire, interview guide and documentation review. The questionnaire generated quantitative data, while the interview and documentation review generated qualitative, both instruments used were complementary.

**Questionnaire**

A questionnaire is a research tool consisting of a set of questions designed to gather information from respondents. Think of questionnaires as a written interview that can be completed in person, over the phone, on a computer, or via mail. They are written in a clear and understandable language to ensure that respondents feel comfortable answering them. The reasons to choose questionnaire as data collection instrument was that some of the respondents should not to be available once are needed by the researcher. The use of questionnaire therefore aimed at securing opinions, judgments, preferences or expression of the attitudes of the respondent.

**Interview Guide**

The researcher used interview guide to collect primary data. The advantage of this method is that the information is quickly collected and accurate. It is used in order to supplement and add to the information got from questionnaire method. The respondent’s views and opinions were recorded to guide and provide answers to the research questions.

**Documentation Review**

The documentation review method was used in secondary data collecting. For this, documents such as journals, books, reports, e-sources, magazines and newspapers were consulted in order to facilitate the researcher to get more information concerning management procedures and successful of coffee processing technologies.

**Administration of Data Collection Instruments**

The whole process of distributing questionnaires was as follows: the researcher first sought approach the institution (RSSB) and some informal sector employers (randomly) and explain the benefit of conducting research in those institutions, and then after, he gave a pre-test questionnaire to fill by selected staffs and employees and this served as pilot questionnaire and after getting feedback on it, he will judge if some corrections are necessary or not.

**V. Findings and Discussion**

**1 General Information to the Respondents**

In this section, the researcher presents the findings of the research extracted from the data collection instruments profile in relation to gender, level of education, experience to the work environment and the basic knowledge on social security in general and pension in particular.

**Table 2: Gender of Respondents**

| Gender       | Frequency  | Percentage   |
|--------------|------------|--------------|
| Male         | 60         | 60.0         |
| Female       | 40         | 40.0         |
| <b>Total</b> | <b>100</b> | <b>100.0</b> |

**Source: Primary data (2023)**

The research showed that among 30 respondents, 60 or 60% were male while 40 or 40% were female, which determine that a big number of the research sample size were male. The gender of the respondents helped to give a general picture of the participants in terms of their gender. It is known that gender is factor that influences health, age and retirement age, and therefore can influence the uptake of pension schemes.

**2. Presentation of Findings**

This section focuses on the analysis and interpretation of data according to research objectives such as to determine the effect of mobilization of contribution on the performance of pension scheme in informal sector in Rwanda, to determine the effect of the use of ICT on the performance of pension scheme in informal sector in Rwanda and to assess the effect of feedback on the performance of pension scheme in informal sector in Rwanda.

**2.1 The Assessment of Effect of Mobilization on the Performance of Pension Scheme in Informal Sector in Rwanda**

**Table 3: View of Respondents on Whether Employees in Informal Sector Know Their Rights and Obligations Concerning Social Security Registration and Contribution**

| Respondents' views | Frequency  | Percentage   |
|--------------------|------------|--------------|
| Strongly agree     | 15         | 15.0         |
| Agree              | 25         | 25.0         |
| Disagree           | 40         | 40.0         |
| Strongly disagree  | 20         | 20.0         |
| <b>Total</b>       | <b>100</b> | <b>100.0</b> |

**Source: Primary data (2023)**

Among 100 respondents 15% strongly agreed that employees in informal sector know their rights and obligations concerning social security registration and pension contributions, 25 respondents representing 25% agreed that employees in informal sector know their rights and obligations concerning social security registration and pension contributions; 40 out of 100 respondents disagree that that employees in informal sector know their rights and obligations concerning social security registration and pension contributions, while 20 respondents out of 100 or 20% strongly disagree that employees in informal sector know their rights and obligations concerning social security registration and pension contributions. The research discovered that more than the half of respondents confirmed that employees in informal sector don't know their rights and obligations concerning social security registration and pension contributions.

**Table 4: View of Respondents on the Importance of Getting Pension Benefits at Retirement Age**

| Views | Frequency | Percentage |
|-------|-----------|------------|
|-------|-----------|------------|

|                   |            |              |
|-------------------|------------|--------------|
| Strongly agree    | 30         | 30.0         |
| Agree             | 60         | 60.0         |
| Disagree          | 10         | 10.0         |
| Strongly disagree | 0          | 0.0          |
| <b>Total</b>      | <b>100</b> | <b>100.0</b> |

**Source: Primary data (2023)**

After carrying out this research, it was found that 30 respondents out of 100 or 30 % strongly agreed that they know the importance of having pension benefits at retirement age; 60 out of 100 agreed that they know the importance of having pension benefits at retirement age while 10 % of respondent ignore the importance of having pension benefits at retirement age. This showed that most of respondents know that at retirement age people needs a specific assistance especially from his own social security contributions regardless other threats.

**Table 5: View of Respondents on the Willingness of Employers in Informal Sector to Declare and To Pay Pension Contributions for Their Employees**

| Views             | Frequency  | Percentage   |
|-------------------|------------|--------------|
| Strongly agree    | 5          | 5.0          |
| Agree             | 20         | 20.0         |
| Disagree          | 55         | 55.0         |
| Strongly disagree | 20         | 20.0         |
| <b>Total</b>      | <b>100</b> | <b>100.0</b> |

**Source: Primary data (2023)**

Table 5 shows that 5 respondents out of 100 representing 5% strongly agreed that employers in informal sector have willingness to declare and to pay pension contributions for their employees; 20 % agreed that employers in informal sector have willingness to declare and to pay pension contributions for their employees; 55 out of 100 respondents representing 55% disagreed that employers in informal sector have willingness to declare and to pay pension contributions for their employees and finally 20 respondents representing 20% strongly disagreed that employers in informal sector have to declare and to pay pension contributions for their employees. This showed that 75% of respondents confirmed that employers in informal sector do not have willingness to declare and to pay pension contributions for their employees.

**Table 6: View of Respondents on Whether Mobilization Campaigns Related To Social Security Made By RSSB Needs To Be Strengthened In Informal Sector**

| Views             | Frequency  | Percentage   |
|-------------------|------------|--------------|
| Strongly agree    | 50         | 50.0         |
| Agree             | 45         | 45.0         |
| Disagree          | 5          | 5.0          |
| Strongly disagree | 0          | 0.0          |
| <b>Total</b>      | <b>100</b> | <b>100.0</b> |

**Source: Primary Data (2023)**

Table 6 shows that 50 respondents out of 100 or the half of respondents strongly agreed that mobilization campaigns related to social security made by RSSB needs to be strengthened in informal sector; while 45 respondents who represent 45% agreed that mobilization campaigns related to social security made by RSSB needs to be strengthened in informal sector. It finally showed that 5 respondents or 5% disagreed that mobilization campaigns made by RSS needs to be strengthened in informal sector. In this section 95% of respondents confirmed that mobilization related to social security needs to strengthened in informal sector.

## Management Practices and Performance of Pension Scheme In Informal Sector a .....

These results are in agreement with the previous authors who showed the importance of public campaigns that seek to sensitize the community on pension scheme contribution. Authors such as McKenzie, et al., (2021), William and Loana, (2021) pointed out the need for mobilization of pension contributions for the informal sector in order to increase the public participation in the pension schemes. This mobilization practices would in turn increase the performance of the pension scheme in the informal sector in Rwanda.

### 2.2 To Determine the Effect of the Use Of ICT on the Performance of Pension Scheme In Informal Sector In Rwanda

**Table 7: View of Respondents on Whether They Do Visit RSSB Social Platforms In Order To Know Laws and Ministerial Orders Governing Social Security and Especially Pension Scheme**

| Views             | Frequency  | Percentage   |
|-------------------|------------|--------------|
| Strongly agree    | 20         | 20.0         |
| Agree             | 25         | 25.0         |
| Disagree          | 40         | 40.0         |
| Strongly disagree | 15         | 15.0         |
| <b>Total</b>      | <b>100</b> | <b>100.0</b> |

Source: Primary Data (2023)

The data in Table 7 shows that 20 respondent or 20 % strongly agreed that they do visit RSSB social platforms in order to know laws and ministerial orders governing social security and especially pension scheme; 25 respondents representing 25% agreed that they do the visit of RSSB social platforms; 40 respondents equal to 40 % disagreed while 15 respondents or 15% strongly disagreed that they make visit RSSB platform in order to much know about laws and ministerial orders governing social security and especially pension scheme.

**Table 8: View of Respondents on the Fairness of Notifying both Employer and Employee In Informal Sector About Social Security Status Using SMS On Regular Basis**

| Views             | Frequency  | Percentage   |
|-------------------|------------|--------------|
| Strongly agree    | 38         | 38.0         |
| Agree             | 55         | 55.0         |
| Disagree          | 3          | 3.0          |
| Strongly disagree | 4          | 4.0          |
| <b>Total</b>      | <b>100</b> | <b>100.0</b> |

Source: Primary Data (2023)

Among respondents, 38 out of 100 representing 38% responded that they were strongly agreed that is fair that RSSB uses SMS on regular basis to notify both employers and employees in informal sector on social security status. 55 respondents or 55% agreed on that practices, 3 respondents or 3 % disagreed while 4 respondents representing 4% strongly disagreed.

**Table 9: View of Respondents on Knowledge of the Tools That Employee in Informal Sector Can Use For Accessing His Social Security Account Anywhere and Anytime**

| Views          | Frequency | Percentage |
|----------------|-----------|------------|
| Strongly agree | 18        | 18.0       |



|                   |            |              |
|-------------------|------------|--------------|
| Agree             | 27         | 27.0         |
| Disagree          | 35         | 35.0         |
| Strongly disagree | 20         | 20.0         |
| <b>Total</b>      | <b>100</b> | <b>100.0</b> |

**Source: Primary Data (2023)**

Table 9 shows that among 100 respondents of our study, 18 or 18% strongly agreed that they know the tools that employee in informal sector can use for accessing his social security account anywhere and anytime. 27 respondents or 27 % agreed they knowledge of tools that employee in informal sector can use for accessing his social security account anywhere and anytime. On this point 35 respondents representing 35% disagreed while 20 of respondents or 20 % strongly disagree that they know any tools that employee in informal sector can use for accessing his social security account anywhere and anytime.

**Table 10: View Of Respondents On The Needs Of RSSB To Improve The Ways Of Communication With Employers And Employees In Informal Sector**

| Views             | Frequency  | Percentage   |
|-------------------|------------|--------------|
| Strongly agree    | 50         | 50.0         |
| Agree             | 44         | 44.0         |
| Disagree          | 4          | 4.0          |
| Strongly disagree | 2          | 2.0          |
| <b>Total</b>      | <b>100</b> | <b>100.0</b> |

**Source: Primary Data (2023)**

After carrying out this research, the researcher found that 50 respondents out of 100 or 50% strongly agreed that RSSB needs to improve the ways of communication with both employers and employees in informal sector. 44 respondents or 44% agreed with the need of communication improvement; 4 respondents or 4% disagree while 2 respondents or 2% strongly disagree. This showed that 94% of all respondents confirmed that the improvement in communication with employers and employees in informal sector by RSSB is needed. Other authors also reported similar results earlier on. For instance, Miti, et al., 2021 and Dreze and Sen (2020) showed that there is significance importance attached to the use of ICT and the performance of pension schemes in Rwanda.

Further, it is important for the management in the informal sector to increase the use of ICT in order to increase the participation in pension scheme and in turn influence the performance of pension scheme in Rwanda.

**2.3 To Determine the Effect of Feedback onthe Performance of Pension Scheme in Informal Sector**

**Table 11: View of Respondents on Whether Workers in Informal Sector Who Complies With Pension Law Are Assisted By RSSB In Case Of Work Accident**

| Views             | Frequency  | Percentage   |
|-------------------|------------|--------------|
| Strongly agree    | 30         | 30.0         |
| Agree             | 46         | 46.0         |
| Disagree          | 15         | 15.0         |
| Strongly disagree | 9          | 9.0          |
| <b>Total</b>      | <b>100</b> | <b>100.0</b> |

**Source: Primary data (2023)**

Table 11 shows that 30 respondents out of 100 or 30% strongly agreed that RSSB assists workers in informal sector who complies with pension law are in case of work accident; 46 respondents or 46% agreed with this assistant. 15

respondents or 15% disagree while 9 respondents or 9% strongly disagreed that RSSB assists workers in informal sector who complies with pension law are in case of work accident.

**Table 12: View of Respondents on Reinforcement of Penalties to the Employers for Delay of Declaration or Remittance of Contributions**

| Views             | Frequency  | Percentage   |
|-------------------|------------|--------------|
| Strongly agree    | 30         | 30.0         |
| Agree             | 57         | 57.0         |
| Disagree          | 10         | 10.0         |
| Strongly disagree | 3          | 3.0          |
| <b>Total</b>      | <b>100</b> | <b>100.0</b> |

Source: Primary data (2023)

Table 12 shows that 30 % respondents representing 30% strongly agreed with the reinforcement of penalties to the employers for delay of declaration or remittance of contributions; 57 respondents out of 100 or 57% agreed with the reinforcement of penalties; 10 respondents disagreed while 3 respondents or 3% strongly disagreed that penalties may be reinforced. This showed that 87% of respondents confirmed that penalties to the employers for delay of declaration or remittance of contributions are to be reinforced.

**Table 13: View of Respondents on the Reduction of People Assisted By the Government In Case Pension Benefits Payment Is Offered To the Former Informal Sector Employees at Old -Age**

| Views             | Frequency  | Percentage   |
|-------------------|------------|--------------|
| Strongly agree    | 63         | 63.0         |
| Agree             | 35         | 35.0         |
| Disagree          | 2          | 2.0          |
| Strongly disagree | 0          | 0.0          |
| <b>Total</b>      | <b>100</b> | <b>100.0</b> |

Source: Primary data (2023)

Table 13 shows that 65 out of 100 respondents or 65% strongly agreed that once pension benefits is offered to the former employees in informal sector at old -age, the number of people sponsored by the Government are reduced; 35 respondents or 35% agreed while 2 respondents representing 2% disagreed. This showed that in case employers comply with pension contribution payment, people who are assisted by the Government would be reduced.

**Table 14: View Of Respondents On The Needs Of RSSB To Work With Other Public Entities To Fulfill Its Obligations To Collect Contributions And Dept Recovery In Informal Sector**

| Views             | Frequency  | Percentage   |
|-------------------|------------|--------------|
| Strongly agree    | 30         | 30.0         |
| Agree             | 37         | 37.0         |
| Disagree          | 18         | 18.0         |
| Strongly disagree | 15         | 15.0         |
| <b>Total</b>      | <b>100</b> | <b>100.0</b> |

Source: Primary data (2023)

Table 14 shows that 30 respondents out of 100 or 30 % strongly agreed that RSSB needs to work with other public entities to fulfill its obligations to collect contributions and dept recovery in informal sector; 37 respondents or 37%

agreed with the partnership; 18 respondents or 18 % disagree while 15 respondents or 15 % of respondents strongly disagreed that RSSB needs to work hand in hand with other entities to collect contributions and dept recovery in informal sector. This showed that 67 respondents confirmed that RSSB needs to work with other entities to collect contributions and making dept recovery in informal sector.

Looking at these results, it is possible to relate with previous reported result by other authors in the same investigations. For instance, authors such as Galasso (2019), Bowen, et al. (2020), Asher and De Ravin (2020), Miti, et al., (2021), Tang, et al., (2020), Kudrna, et al., (2022) had reported the need for good management practices in order to improve the performance of pension schemes in Rwanda. more particularly, the use of feedback system can help the management to gather more relevant information that can guide the overall performance management in the pension scheme especially for the informal sector.

**4.3 Inferential Statistics**

This section presents the inferential statistics that helped the researcher to adequately measure the relationship between the study variables. It also helped the researcher to capture the effect of the independent variables on the dependent variable using the regression and ANOVA analysis.

**Table 14: Correlation Analysis Results**

|              |                     | Performance | Mobilization | ICT Use | Feedback |
|--------------|---------------------|-------------|--------------|---------|----------|
| Performance  | Pearson Correlation | 1           |              |         |          |
|              | Sig. (2-tailed)     |             |              |         |          |
|              | N                   | 100         |              |         |          |
| Mobilization | Pearson Correlation | .874**      | 1            |         |          |
|              | Sig. (2-tailed)     | .003        |              |         |          |
|              | N                   | 100         | 100          |         |          |
| ICT Use      | Pearson Correlation | .703**      | -.133        | 1       |          |
|              | Sig. (2-tailed)     | .002        | .188         |         |          |
|              | N                   | 100         | 100          | 100     |          |
| Feedback     | Pearson Correlation | .658**      | -.013        | .012    | 1        |
|              | Sig. (2-tailed)     | .000        | .896         | .909    |          |
|              | N                   | 100         | 100          | 100     | 100      |

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

**Source: Primary data (2023)**

Table 14 reports the correlation analysis using the Pearson Correlation method. As per the results, the Pearson correlation showed that mobilization of contribution (r=0.874, p=0.003) positively affect the performance of pension scheme in the informal sector. Hence, it is important for the promoters and the government to continuously to sensitize and mobilize the public on the contribution towards the scheme. In addition, this should be done for the informal sector to ensure there is continuously improve their future lives at old age. Similarly, the use of ICT (r=0.703, p=0.002) in the pension scheme was found to positively influences the performance of pension scheme for informal sector. This implies that the use of information technology in the contributions of pension schemes can help in improving the uptake of pensions in the informal sector.

Finally, the Pearson correlation analysis showed that feedback (r=0.658, p=0.000) is positively and significantly related to the performance of pension scheme in the informal sector. This is important as it shows that the feedback system can help in gathering more information about the pension scheme plan for the informal sector. Consequently, the providers should allow for the feedback in order to increase the performance of the pension plans in the informal sector. The findings are in congruent with the findings by other authors such as McKenzie, et al., (2021) and William and Loana, (2021) who pointed out the need for pension contribution campaigns geared towards sensitizing the public on the need to participate in pension schemes.

**Table 15: Regression Model Summary**

| Model | R                 | R Square | Adjusted R Square | Std. Error of the Estimate |
|-------|-------------------|----------|-------------------|----------------------------|
| 1     | .781 <sup>a</sup> | .611     | .599              | .16104                     |

a. Predictors: (Constant), Mobilization, ICT Use, Feedback

**Source: Primary data (2023)**

Table 15 reports the multiple regression model in summary form. As per the findings, the regression model gave results for R=0.781 and for the R<sup>2</sup>= 0.611. Using the R<sup>2</sup> statistics, the results showed that 61.1% of the performance of pension schemes in the informal sector in Rwanda can be explained by the management practices such as contribution mobilization, use of ICT and feedback systems in the pension plans. Stiglitz (2018), Guven, et al., (2019), Guven (2019) Miti, et al., (2023) who showed the importance of carrying out campaigns that increase the public awareness about pension contributions, reported similar results. Moreover, these mobilization campaigns would increase the level of participation by the workers in the informal sector.

**Table 16: Analysis of Variance (ANOVA) output**

| Model |            | Sum of Squares | df | Mean Square | F      | Sig.              |
|-------|------------|----------------|----|-------------|--------|-------------------|
| 1     | Regression | 3.905          | 3  | 1.302       | 50.194 | .000 <sup>b</sup> |
|       | Residual   | 2.490          | 96 | .026        |        |                   |
|       | Total      | 6.395          | 99 |             |        |                   |

a. Dependent Variable: Performance

b. Predictors: (Constant), Mobilization, ICT Use, Feedback

**Source: Primary data (2023)**

Table 16 reports the analysis of variance where the results (F=50.194, p=0.000) showed that the regression model was statistically significant since the p-value was less than 5%. This implied that the regression model could be used to interpret the effect of management practices on the performance of pension schemes in the informal sector in Rwanda. The results are in line with other reports given by earlier authors such as Ivambi (2016), Chinnamanaidu and Chalam (2019), Marchetti, et al., (2021) and Michael, et al., (2022). These authors have shown that there is need for improvement of pension scheme in the informal sector. More particularly, they have emphasized the need to use ICT and best management practices in order to improve the performance of pension scheme in Rwanda.

**Table 17: Table Of The Regression Coefficients**

| Model |              | Unstandardized Coefficients |            | Standardized Coefficients | t      | Sig. |
|-------|--------------|-----------------------------|------------|---------------------------|--------|------|
|       |              | B                           | Std. Error | Beta                      |        |      |
| 1     | (Constant)   | 1.701                       | .260       |                           | 6.554  | .000 |
|       | Mobilization | .115                        | .034       | .218                      | 3.359  | .001 |
|       | ICT Use      | .213                        | .045       | .300                      | 4.685  | .000 |
|       | Feedback     | .366                        | .035       | .677                      | 10.460 | .000 |

a. Dependent Variable: Performance

**Source: Researcher 2023**

The results reported in Table 17 relates to the multiple regression coefficients. As reported in the table, mobilization of contribution ( $\beta_1=0.115$ ,  $p=0.001$ ) towards the pension scheme in the informal sector positively influence the performance of the pension scheme in the informal sector. This implied that one percent change in the contribution mobilization management practices would improve the pension performance by 0.115 percent. Similarly, the use of ICT ( $\beta_2=0.213$ ,  $p=0.000$ ) was found to have a positive and statistically significant effect on the performance of pension schemes in the informal sector in Rwanda. Furthermore, a one percent increase in the use of ICT would improve the pension performance by 0.213 percent.

Lastly, the feedback practices ( $\beta_3=0.366$ ,  $p=0.000$ ) as part of the management practices in the pension scheme statistically and positively influences the performance of the pension schemes in the informal sector in Rwanda. A one percent increase in the use of feedback system, would improve the performance of pension scheme by 0.366 percent. These

results can be interpreted in line with other findings reported earlier by other researchers. For instance, Bowen, et al. (2020), Miti, et al., (2021) and Kudrna, et al., (2022) have indicated that there is positive effect of management practices on the performance of pension schemes in the informal sector.

### VI. Conclusion

Based on the above findings, research questions and objectives, the researcher concludes at some extent that public mobilization towards the contribution of pension schemes in the informal sector bears fruits. This is because through public mobilization, many people have ended up joining the pension scheme and contributed successfully over time. In addition, holding mobilization campaigns tend to help in creating public awareness in pension scheme and therefore many people join the scheme. Hence, this tend to improve the contributions received by the pension fund.

The researcher focused on management practices on the performance of pension scheme on informal sector and according to the objectives set he concludes the following. Management practices are very important and play crucial role to boost pension scheme especially in informal sector. This will not only contribute to the socioeconomic growth of the employees before and after retirement but also to the growth of national economy in general. As revealed, management practices and performance of pension scheme in informal sector are strongly correlated.

The management practices such as use of ICT in pension registration, payments and benefit awards important improve the performance of the scheme. The research concluded that managers in this schemes should always focus on growing the technological use and move with the modern available technology in order to increase the performance of pension scheme. In the informal sector, use of ICT is very important as it tends to increase pensioners accessibility to the scheme. This creates convenience and thereby more people will enroll to the scheme.

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