

SUSTAINABLE PERFORMANCE OF MICROINSURANCE IN LOW-INCOME MARKETS

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Abstract

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Sustainable performance in microinsurance offering in low-income markets is important to ensure that the service simultaneously achieves corporate profitability and poverty alleviation. Sustainable performance requires a balanced integration of supply and demand factors in the offering of the service. Microinsurance is still supply driven thereby creating a lopsided mismatch between demand and supply that leads to oversupply and low uptake. On the basis of extant literature, the paper aims to propose and discuss factors critical to demand and supply of microinsurance. A conceptual framework for sustainable microinsurance is presented with individual metrics that can be addressed as managerial tools for driving and controlling sustained superior performance. While this is a theoretical paper, microinsurance practitioners may benefit from the application of the presented theory.

Keywords: Microinsurance, Sustainable Performance, Low-income Markets, Demand-side, Supply-side

1. INTRODUCTION

The initial adoption of the low-income insurance market focused on downscaling traditional insurance policies with very little attention to the needs and context of poor people (Cohen & Sebstad, 2006, p. 29). This manifested in a mismatch between offered products and consumer preferences leading to low uptake, persistence and renewal rates. Understanding the real needs and preferences of consumers helps the supply-side to respond with appropriate policies as well as coming up with strategies that drive adoption of the policies by the poor (Churchill & Matul, 2012). Designing policies that fail to meet consumer needs or preferences is wasteful and unsustainable. Matching demand and supply is effective as it leads to the design of customized products from a deep understanding of customer needs thereby creating sustainable value (Esper, Ellinger, Stank, Flink, & Moon, 2010).

The insurance industry is the biggest commercial activity in the financial sector (Lee, Lee, & Chiu, 2013). Added to that, the industry is growing at a phenomenal rate (Pan, Chang, & Su, 2012). Thus the insurance industry has an important role to play

in the development and sustainability of the global economy. Insurers are more and more aware of their social obligation to the development of excluded people in low-income markets. To that effect, many top global insurers have entered the low-income market segment with great optimism. Unfortunately a few have managed to be profitable yet only profitable microinsurance are sustainable (Smith, 2016).

Microinsurance has transformative powers to accelerate socio-economic development in poor communities. Access to financial services can unlock new opportunities for previously excluded poor people (Karlan & Morduch, 2009, p. 4704). There is great potential for microinsurance to contribute to economic development of low-income markets. Such economic development and growth can attract a host of international investors into emerging markets and influence performance (Li & Julie, 2008). Its current contribution is dismal but with a vast upside. For instance, in Nigeria Ime & Ikechukwu (2017) report that insurance penetration is a negligible 0.68 percent and only contributes a measly 0.72 percent to the GDP. Be that as it may,

the industry is unsure on how it can measure success (Smith, 2016).

Microinsurance sustainable performance includes several dimensions including financial performance, social impact on poverty and economic growth. This study focuses on social dimensions necessary for microinsurers to contribute to poverty alleviation while maintaining profitability. In this study sustainable performance refers the balancing of the demand and supply-side of the firm in such a way that creates social benefits to the community while generating profits for the firm. There is a general dearth of research on the impact of microinsurance on society (Apostolakis, Van Dijk, & Drakos, 2015). Performance measurement is important for an evolving industry like microinsurance. This study will highlight factors that shape microinsurance impact on poverty alleviation. Not much work has been done to assess the performance of microinsurance. The fact that it has been in short existence, explains why it lacks comprehensive performance measurement frameworks. It would be interesting to look at the market size, penetration and performance measurement in microinsurance.

1.1. Purpose of study

Microinsurance primarily aims to achieve profit while alleviating poverty. Achieving these two objectives require a balanced demand-side and supply-side initiatives. A mismatch in demand and supply in the microinsurance inhibits the full potential of the sector. The purpose of the study is to propose demand-side and supply-factors that can be integrated to sustainably create sustainable value in microinsurance.

1.2. The aim of the study

The study aims to achieve the following objectives;

1. To identify demand-side and supply-side factors important to sustainable performance of microinsurance.
2. To propose, theoretically, a conceptual framework to integrate the demand and supply side factors.

1.3. Problem statement

The insurance industry is predominantly supply driven and this has resulted in a glaring mismatch between the microinsurance products offered and the risk mitigating strategies needed or preferred by low-income people (Pan, Chang, & Su, 2012). Consequentially the adoption and penetration of microinsurance in low-income markets is dismal (Ime & Ikechukwu, 2017). This has caused an unsustainable microinsurance industry as a supply-driven microinsurance fail to capture the real needs of low-income people.

In the next section, the paper reviews the literature on the demand-side of microinsurance. It proposes factors that need to be addressed in order to increase uptake and adoption of microinsurance. In section 6, the supply-side of microinsurance is discussed. Factors that are important to the supply of microinsurance are proposed based on reviewed literature. The integration of the demand and supply

factors is presented in section 7 through a conceptual framework suggesting a balanced integration of demand and supply in order to generate sustainable microinsurance performance. Finally, in section 8 the conclusion of the study is drawn.

2. DEMAND-SIDE OF MICROINSURANCE

Carefully understanding the insurance needs and preferences of poor people is important for microinsurance growth (Radermacher, Dror, & Noble, 2006, p. 71). Microinsurance low uptake or non-consumption is a serious problem in low-income markets as offered products fail to meet consumer preferences (Biener & Eling, *Insurability in Microinsurance Markets: An Analysis of Problems and Potential Solutions*, 2012; Eling, Pradhan, & Schmit, 2014; Cohen & Sebstad, 2006, p. 29). As an indication of the need or demand for microinsurance, poor people have been observed to use some rudimentary asset-depleting financial risk coping strategies (Lashley & Warner, 2015). The consumption of modern insurance is still low in low-income markets. Insurers have to activate the market in order to create the necessary demand from a large pool of clients to avoid adverse selection (Ulbinaitė, 2013). Lack of a stable income and financial resources has been cited as the main cause of non-consumption (Adebayo, et al., 2015). Other factors such as lack of trust, geographical location, educational background and transport costs have also been observed to negatively affect the demand for microinsurance (Fenny, Kusi, Arhinful, & Asante, 2016). The demand-side of microinsurance, like most services targeted at the low-income, needs to be created through market creation (Amsden, 2010). Market or demand creation involves innovation that make products simpler, cheaper and accessible to low-income people while creating jobs and other agency opportunities (Mezue, Christensen, & Bever, 2015). Demand creation has transformative poor by capacitating and monetizing the poor thereby enabling poor markets to move towards sustainable markets (Viswanathan & Sridharan, 2009). Improving human capabilities and creating opportunities for employment and entrepreneurship should be extended to the poorest of the poor to improve their wellbeing (Seelos & Mair, 2007; Meagher, 2015).

There is a huge mass of people that are exposed to multifarious risks that could potentially become microinsurance consumers. However, it would be the gravest miscalculation to assume that vulnerability equates to effective demand (Brown, 2001). Many microinsurers misconstrued need for insurance for coping with risks with effective demand (Koven & McCord, 2014). The goal of microinsurance should be to create a market, hence involving other stakeholders is important (Smith, 2016). The failure to turn latent demand into effective demand by people living in deep poverty is because they lack the means to do so. In such a scenario, affordability of premiums would not be a solution as there is virtual incapacitation. Current research on affordability and ability to pay look at residual income an ex-post analysis of expenditure of income earned. However, capacitating the poorest of the poor's ability to pay should take an ex-ante

approach that helps them to raise their incomes, education, assets wealth, savings and other means that can help them increase production and consumption (Ahuja & Jutting, 2004). The poor in developing countries are barely eking a life on the margin at the subsistence level such that they cannot spare anything for insurance which is only consumed in the future (Gray & Moseley, 2005).

The poor generally lack the ability to exercise effective demand. To some degree, they are unwilling to pay for insurance, a service which they struggle to understand. Those that are capable and willing to pay are critical to the need the service fulfills and whether it creates value for money (Ram & Needham, 2017). The poor are not well informed about insurance hence there is the weak uptake of the service (Ito & Kono, 2010). The design of most microinsurance products is not well tailored to the poor's circumstances. For instance, the requirement for huge upfront payments, restrictive transaction costs and receiving service from unknown parties may dissuade the poor. On the other hand, Abbas, et al. (2015) tested the acceptability of flood insurance as a viable mechanism to cope with financial risk and concluded that there is a high acceptance by low-income people. These encouraging conclusions demonstrate the possibility of turning low-income markets into the potential insurance business.

The microinsurance demand is largely latent and untapped. There is a phenomenally huge need for risk protection by low-income people yet Giesbert & Steiner (2015) observed a generally weak demand for microinsurance products. Liu & Myers (2016) concur with this notion of weak microinsurance demand in developing countries. Though demand is disappointing, exposure to risks is a constant that poor households grapple with causing endless poverty (Matul, Dalal, De Bock, & Gelade, 2013). Churchill (2007) opines that there is need to continuously educate targeted low-income customers in order to create the market or demand. Due to low education levels and poor insurance product knowledge in low-income markets, insurers should constantly provide information about their products (Gehrke, 2014). The microinsurance concept is fairly new in emerging markets. Aggressive awareness campaigns about the importance of microinsurance could be spearheaded by the industry demonstrating the benefits of the service. Various information dissemination channels such as mobile networks, associations, or clubs can be used to reach the poor. The use of institutions in which the poor are organized can increase uptake through testimonials, referrals, and good-word-of-mouth. These channels may also be used to collect premiums and handle claims. But knowledge alone is not enough, the market needs to be capacitated to exercise effective demand.

People in low-income markets have insurable assets and are even more prone to debilitating risk shocks than anyone else. As a rule of thumb, the greater the vulnerabilities of a household, the greater the need for hedging (Ime & Ikechukwu, 2017). There are market gaps that the insurance industry can satisfy. However transferring insurance policies designed from developed countries may not work in the context of poor countries (Abbas, Arujath-Badu, Kachele, & Muller, 2015). The priorities and insurance needs of poor people are

different from those of the higher income groups (Pooja & Jha, 2015). Instead, the industry should customize its products to the context of low-income customers. Microinsurance firms should invest in understanding the real needs and behavior of low-income persons in order to spot opportunities and design value generating products. Cole (2015) observed that the adoption of auxiliary financial services such as savings, credit and insurance will increase as more and more people enter mainstream financial markets drawn by payment services. While the advancement of these services is unavoidable, their beneficial value to consumer welfare and firms' financial performance is ambiguous. Poor people are neither acquainted with insurance in general nor aware of its benefits. Some think it is for rich people and have a distrust that it will do harm than good. They are illiterate and to make matters complicated they are served by parties they do not know. The level of literacy is a key determinant of the acceptance and adoption of financial services including microinsurance (Monticone, 2010).

Within the low-income markets, access to microinsurance is not equally advanced. The needs of women are discriminated and extremely excluded (Ime & Ikechukwu, 2017). Context-specific products designed to enhance women's economic productive capacity are limited. The insurer should work to attract women by designing products peculiar to risks that affect them, for example, childbirth (Pooja & Jha, 2015). Only now insures in South Africa, for example, are starting to develop microinsurance policies that capture the risk profiles of women and customize products to their specific preferences. Improving women's access to microinsurance is fundamentally important as an intervention to community development. Increased economic participation of women is generally linked to improved household resources allocation. Therefore addressing women's preferences and factors that constrain their access to financial services including microinsurance would increase their participation and enhance chances of sustainably alleviate poverty in poor communities (Fletschner & Kenney, 2014).

Poor people live in a predominantly cash economy with routine adaptive solutions to challenges that perpetuate a culture of poverty. Therefore creating a market or raising the incomes of the poor should come about behavioral changes that break the culture of poverty through the destruction of the psychological and social core of this culture (Lewis, 1966). Low-income people continue to be excluded from critical services like microinsurance because they are disempowered, disorganized to use their social power to claim access (Dror & Jacquier, 1999).

There is interest to serve low-income markets with microinsurance services (Gehrke, 2014; Biener & Eling, The Performance of Microinsurance Programs: A Data Envelopment Analysis, 2011). Microinsurance is being offered in low-income markets to insure people outside of the predictable formal economy. In the high-income segments, insurance might be mandatorily collected at the source of income or attached to a related transaction. In low-income markets, because of lack of income, it is impossible to apply mandatory insurance. Individuals are left to decide on whether to insure or not. When the decision to insure is

voluntary, insurance firms run the risk of adverse selection whereby people exposed to higher risk are likely to insure while people with lower risk are unlikely to insure. Successful insurance should avoid adverse selection by making insurance available to a diverse clientele. In low-income markets, insurers should make the service available to a greater pool of people to avoid adverse selection.

In an effort to circumvent exorbitant premiums in formal insurance, low-income people have rudimentary informal risk management strategies of coping with risks through informal insurance or self-insurance (Banerjee & Duflo, 2007; Bonan, Dagnelie, LeMay-Boucher, & Tenikue, 2016). They apply both ex-ante and ex-post self-insurance and shared risk insurance techniques to cushion themselves from unforeseen eventualities (Dror & Piessse, 2014). These coping strategies may lack depth and breadth or be insufficient to fully cover repeated risks (Torkestani & Ahadi, 2008) but are a sufficient indication that the poor have indeed demand for insurance (Gupta, Venkataramani, Singh, & Ambarkhane, 2015). Failing to adequately cover risks can be a hindrance to escaping poverty. Microinsurance can potentially integrate these risk management strategies into formal mechanisms which can improve incomes and welfare of the poor (Cole, 2015). Low-income people are atypical laggards who are less informed and lowly educated. They usually adopt products or services after observing someone from their close community enjoy the benefits. In microinsurance, Simon, et al. (2014) observed that realization of benefits through observing early adopters enjoying the value of microinsurance help to drive uptake and renewal rates. Inactivating demand, microinsurers should demonstrate the benefits of their products by delivering on the promises or through simulations to highlight how insurance restores value to the insured.

2.1. Awareness

Insurance is poorly understood by uninsured poor people which affect their awareness of the benefits of insurance (Savitha, 2014; Panda, Chakraborty, & Dror, 2015). Poor people are not easily aware of opportunities open to them (Mubangizi, 2011). They are hardly aware of insurance risk management available to them (Savitha, 2014). They require concerted efforts, firstly to capacitate them to recognize opportunities they can take advantage of for self-advancement and secondly how to participate to reduce their own poverty. Without prior knowledge or personal experience, poor people are constrained to fully capture the value of opportunities by their limited exposure (Shane, 2000). Insurance is a new concept for poor illiterate people in the informal sector who have no understanding of insurance products (Donkor & Leftley, 2014). Lack of awareness negatively affects adoption of microinsurance. Abbas, et al. (2015) note that increasing awareness about risk and mitigation of the microinsurance instrument through formal and informal education increases the adoption rate.

2.2. Financial literacy

Low-income people are generally unfamiliar with the insurance concept (Brouwer & Akter, 2010). Bonan, et al. (2016) hold that the concept is alien to low-income markets. Insurance is a sophisticated financial product that even educated people find hard to comprehend (Mpedi & Millard, 2010). Illiterate people may be aware of the various risks and microinsurance programs available but the problem is that awareness on its own is not sufficient, it does not equate to knowledge (Abramson & Piltch-Loeb, 2016). Policy take-up and renewal is affected by insurance knowledge yet awareness of insurance is low among poor people (Subramanian, 2014). Patt, et al. (2010) observed that people who are less informed about microinsurance are unlikely to adopt it. The authorities propose insurance literacy through education, information dissemination and campaigns to drive adoption and increase take-up. Bonan, et al. (2016) report that insurance product literacy has a positive effect on its adoption. In support Matul, et al. (2013) say that financial literacy in particular and not education, in general, has a profound effect on demand.

2.3. Willingness to pay

The challenge with the willingness to pay is that it is not universally transportable. There are various other factors that affect human decision making apart from willingness. For microinsurance demand such factors as emotion, familiarity with the risk and degree to which the customer perceive the risk to be under control greatly influence the buying decision. Brouwer & Akter (2010) observed that consumers with the same characteristics and facing similar risks may still make different decisions about risk management because their perception about risk is from varied personal experiences. Abbas, et al.(2015) noted that poor people show an unwillingness to pay premiums as a proportion of household income. Again, willingness to pay without the ability to pay will not lead to the participation of the poor. Some authorities suggest that helping low-income people increase their earning through income generating projects would increase their willingness to pay (Mathauer, Schmidt, & Wenyaa, 2008; Gustafsson-Wright, Asfaw, & van der Gaag, 2009; Fahad & Jing, 2017). Willingness to pay is crucial to management to gauge feasibility and setting prices. Management should pay attention to design affordable and simplistic products that may drive the willingness to pay (Asenso-Okyere, Osei-Akoto, Anum, & Appiah, 1997; Braun, Schmeiser, & Schreiber, 2016). Willingness to pay can be improved through educating the target market about insurance and utilizing social networks as a catalyst to influence participation (Jain, Swetha, Johar, & Raghavan, 2014).

2.4. Delayed consumption

Poor households do not appreciate the inherent value of microinsurance. The poor are reluctant to give up a proportion of their meagre income for insurance coverage (Apostolakis, Van Dijk, & Drakos, 2015). As a pre-paid service, microinsurance requires substantial savings before consumption

making it difficult to sell amongst cash-strapped people with a generally poor understanding of the benefits of an intangible service. Because it does not give immediate gratification, insurance is a low spending priority. The poor view the investment in insurance as consumption. The poor consume on the margin with little or virtually no savings. They are highly price sensitive such that anything that is paid now with later benefits may be crowded out by immediate basic needs and will suffer non-consumption (Kahle, Dubiel, Ernst, & Prabhu, 2013). Due to the fact that the benefits of microinsurance are not immediate and futuristic, it is easily sacrificed if there is a shock in the customer's income (Kumar, 2017). Group policies can be used to ensure that members continue to motivate each other to maintain or renew policies. Microinsurance can be offered as group policies to a group of people or it can be offered as individual policies (Biener & Eling, *The Performance of Microinsurance Programs: A Data Envelopment Analysis*, 2011). Group policies have been observed to be cost-efficient than individual policies as it is costly to manage large volumes of small policies (Mpedi & Millard, 2010). In India, Pooja & Jha (2015) observed that group microinsurance policies have higher total premium amount than individual policies. Group policies can grow rapidly in communities where people are organized in self-help groups. The services can also be offered as single risk scheme or it can be bundled with other related financial services or unrelated service into a composite scheme. Various carriers can syndicate to underwrite microinsurance schemes which could reduce the premium significantly.

2.5. Affordability

The poor may show great interest in microinsurance policies but do not adopt the products because they cannot afford them (Brouwer & Akter, 2010). Families with low incomes struggle to meet basic needs hence they prioritize immediate consumption needs (Banerjee & Duflo, 2007). A high income-to-needs ratio has been observed to force families to put off any kind of investments such as microinsurance (Kim, Huang, & Sherraden, 2014). Affordability refers to the ability to lower prices to the utility level of low-income customers (Anderson, Markides, & Kupp, 2010; Anderson & Markides, 2007). Where costs are too high and cannot be lowered some poor households may be unable to pay. The poorest have very little if anything (Maile, 2013). The affordability concept assumes that the poor already have a minimum income. Ram & Needham (2017) found out that affordability is relative and not homogenous among poor people. There are vulnerable groups who lack any income (Al-Ghuraiz & Enshassi, 2005). Therefore, focusing on people who already have a minimum income and can afford what is being offered in the low-income market is problematic as it will further the marginalization and exclusion of the poorest of the poor (Bassem, 2012; Meagher, 2015). A durable solution to include the poor is without doubt to capacitate their ability to pay and accumulate wealth by capacitating them to generate and earn sustainable incomes. Improving the asset base of the

poor may strengthen their ability to pay (Molyneux, Hutchion, Chuma, & Gilson, 2007).

2.6. Ability to pay

Lack of effective demand is the major hindrance of the growth of microinsurance (Da Costa, 2013). Liquidity or financial constraints hamper effective demand for microinsurance especially for the poorest of the poor in low-income markets (Bonan, Dagnelie, LeMay-Boucher, & Tenikue, 2016; Matul, Dalal, De Bock, & Gelade, 2013). Most product offerings in low-income markets mistakenly assume the poor have some minimum income. Yet in extreme poverty, some people may not have anything. Ability to pay is affected by the poor's level of incomes and the family budget is the major determinant of ability to pay (Pavlova, Groot, & Van Merode, 2004). Inability to pay is the greatest cause of non-payment and non-consumption of services (Booyesen, 2001). Sustainability of any service in low-income markets depends on its consumption or adoption by the low-income people. Abbas, et al. (2015) note that the adoption of insurance is chiefly influenced by the ability to pay. Savitha (2014) adds that inability to pay excludes the poor from microinsurance. Surprisingly ability to pay is not thoroughly analyzed in the insurance literature. Mpedi & Millard (2010) observed the poor to be incapacitated to take advantages of insurance opportunities due to low earnings. Jutting (2003) outlined that the poor require a minimum level of income to participate in the microinsurance market, without which they may remain excluded. Inability to pay by poor people is inextricably intertwined to the inefficient monetary economic system that systematically excluded interaction with poor people. Coupled to this is the structure of financial instruments that were never designed with the poor in mind. Addressing these constraints of solvent demand requires radical inclusive approaches. By the same token, improving demand will, without doubt, improve supply (Dror & Jacquier, 1999).

The importance of the ability to pay in low-income markets is downplayed yet it has a profound effect on the adoption of insurance policies. It is most critically important in cash-strapped low-income markets. While affordability is a salient factor in the ability to pay, it is insufficient on its own to create effective demand. Affordability is an estimation on the cost side that tries to establish premiums or prices in general at a level commensurate with the level of income of the buyers. This does not fully explain the ability to pay which is dependent on the continuous supply of income to meet the monthly premium (Bernard & Dempsey, 2005). Diversified sources of income can capacitate low-income people to adopt insurance products (Abbas, Arujath-Badu, Kachele, & Muller, 2015). Ability to pay is the key driver of effective demand. Poor people lack the means to effectively demand even the most affordable services. The demand for insurance has been observed to vary with income levels. A positive relationship between life insurance demand and income has been established. In a 41 countries study, Lee, et al. (2013) observed that the poor who lack the means to buy insurance demand less of insurance products. Without directed effort to address this inadequacy,

poor people will remain outside the mainstream markets making it hard to address poverty. To sum it up, Bawa & Verma (2011) concluded that lack of the means or capacity or funds is the key barrier to insurance uptake in low-income markets. Without capacitating ability to pay, the poorest of the poor's inability to pay will leave them excluded reducing any financial protection potential from microinsurance (Ekman, 2004). The demand-side of microinsurance is as critically important as its supply-side. Without concerted effort to create the market or demand for microinsurance, all efforts on the supply-side will come to a naught. Say's law that state that supply creates its own demand it does not work in low-income markets (Amsden, 2010). Enterprises need to capacitate the poor to create consumption or production of their products or services.

3. SUPPLY SIDE OF MICROINSURANCE

Development of microinsurance has drawn the interest of service providers into emerging markets (Ito & Kono, 2010). Through financial deepening, microinsurance can increase employment, improve income levels and stability through the initiation of greater investments (Apostolakis, Van Dijk, & Drakos, 2015). It has the direct impact on the economic status of the individual poor's welfare through income stabilization, access to health and financial services, and sophisticated risk management. Microinsurance may not be a wholesome panacea for eliminating the poor's vulnerabilities but it is a huge contributor and complementary mechanism to coping with unexpected shocks (Cole, 2015). Microinsurance is specifically designed based on the profile of low-income consumers. It acknowledges the different idiosyncratic differences of low-income markets to high-income segments. The thinking is that the poverty trap can be reduced by managing vulnerabilities of unexpected shocks that cause the poor to slip into poverty. Microinsurance increases certainty of future outcomes thereby encouraging households to take investment initiatives that enhance their economic capabilities. Extending financial services to low-income households is emphasized and microinsurance is an important aspect of this development. More than any other social group, the poor are in dire need of financial services (Collins, Morduch, Rutherford, & Ruthven, 2009, p. 14). However, the design of those financial products should be based on needs and preferences of poor people (Churchill & Matul, 2012).

Microinsurance can be used to eradicate poverty (Chandhok, 2009). Lack of insurance has been identified as one of the financial constraints on low-income microentrepreneurs growth and development (London, Anupindi, & Sheth, 2010). Hamid, et al. (2011) identified a positive relationship between microinsurance and poverty reduction. Insurance coverage reduces the chance of the poor falling into the poverty trap. Insurance policy design is highly standardized and regulated such that innovation and flexibility to match the clientele profile of low-income customers is very difficult (Kwon, 2010). Microinsurers are therefore challenged to look for legal ways to design policies that can cover the real risks of the poor.

3.1. Product customization

The supply-side of microinsurance is continuously developing innovative products aimed at attracting people excluded from mainstream markets. This has been observed to outmatch the demand of the service. Insurers have been blamed for introducing scaled-down policies from higher income segments into the low-income market (Cohen & Sebstad, 2006, p. 29). This has not produced great rewards. In fact, the insurance industry as a whole should promote research and development of microinsurance products that are responsive to the needs of the poor. Microinsurers are found to push high premium policies at the expense of what the market needs (Gupta, Venkataramani, Singh, & Ambarkhane, 2015). They should carry out experimentations to find the right features for the product that addresses the poor's risk protection needs. Insurers should customize their products to the idiosyncratic characteristics of low-income customers. The adoption of appropriate strategies to address idiosyncratic constraints and in some cases institutional voids in emerging markets is paramount (Li & Julie, 2008). Microinsurance policies can be customized in such a way that individual policies are designed for those who can afford while consumers who cannot can be offered group policies (Kumar, 2017).

3.2. Research and development

Research and development is important in latent markets in order to anticipate and capture opportunities. Research is needed to gain a deeper understanding of the needs of low-income customers. The firm should invest in research and development that build capabilities that can support radical innovation in creating new products that can swiftly shift product-market structures (Darroch & Miles, 2011). Firms that create markets in low-income markets need to possess superior market sensing and opportunity recognition capabilities to develop products needed in latent markets. This requires advanced science and technology capabilities in research and development complemented with vigorous marketing capabilities that create and manage demand in the new market.

3.3. Pricing data

The insurance industry heavily dependent on data to input into actuarial models for designing policies and estimating premium prices. Data is required to predict the future profitability of policies based on informed assumptions (Mannacio, 1981). Without sufficient data, the ability to make an informed judgment is hampered. Microinsurance lacks sufficient and reliable data for estimating premiums and prices as insurers are generally averse in sharing competitive information. The industry has a short track record in the microinsurance segment (Kumar, 2017). Furthermore, there are poor internal and external reporting standards. Some common approaches and practices for setting premium prices are rendered inapplicable due to the data availability constraint. Without sufficient data, estimating premiums for pricing is negatively affected. Insurance firms are forced to price policies under

conditions of uncertainty. The result is that insurers will be forced to make restrictive assumptions about risks to be insured. This creates pricing risk whereby microinsurers may either charge substantially high or subsidized premiums. High premiums will render the service unaffordable while low premiums may expose the insurer to insolvency risks as a result of underpricing. Precision in the estimation of risk and therefore premiums helps management to set competitive prices. Beiner (2013) reveals that these constraints curtail the development of the microinsurance sector and discourage other initiatives given the fact that the demand for the service is lukewarm. Advancement in proxy methodologies that can estimate premiums under uncertainty using data from other markets with similar characteristics would improve decision making. The sustainability of insurance requires premiums that balance off insolvency risk and affordability of the service. Perhaps the insurance sector may be encouraged to share data or regulators may compulsorily instigate for sharing of data in order to sustainably develop the industry.

3.4. Distribution

The supply and access to microinsurance products especially those that lever access to finance by poor people should be transparent and well-coordinated by stakeholders with reach to remote areas where poverty is more prevalent to ensure inclusivity (Woldie, Mwita, & Saidimu, 2012). The problem as highlighted by Dror & Jacquier (1999) is that insurers are lethargic to invest enough to serve the low-income segment. The reluctance emanates from the poor's weak reception of the service and the constraints that insurers have to gripe with for a successful microinsurance program. Since the industry is still in its embryonic stage, government, insurers and other interested stakeholders can incentivize micro-insurers to penetrate low-income markets (Ime & Ikechukwu, 2017; Tom & Selvam, 2010).

3.5. Complementary partners

Consumption of microinsurance can be increased through co-creating related or unrelated services bundled up with insurance that brings a constellation of partners (Pels & Kidd, 2015). Complementary partners in the co-creation of insurance products can increase insurability through diversification of the risk and risk mitigation strategies (Biener & Eling, *Insurability in Microinsurance Markets: An Analysis of Problems and Potential Solutions*, 2012). In high-risk areas such as those obtaining in agriculture and catastrophic risk exposure, risk sharing arrangements through public-private insurance schemes can increase the financial capacity to deal with high-severity risks (Huber, 2004; Linnerooth-Bayer & Hochrainer-Stigler, 2015). Insurers can increase the adoption of microinsurance products by thoroughly interrogating the needs of the target market. In order to make inroads into the preferences of women, effort should be made to understand their context and design products that match women's particular needs (Fletschner & Kenney, 2014).

3.6. Technology advancement

Advancement in technology can be utilized to address some of the constraints of the development of microinsurance. Advances in remote sensing technologies help risk management and mitigation in agriculture microinsurance. The use of indices in advanced objective assessments has made some previously uninsurable risks insurable (Gehrke, 2014). The sensory systems can work as early warning systems for risk reduction (Lashley & Warner, 2015). The ubiquity of mobile technology in low-income markets makes one of the pervasive transformative agents of our time. Mobile technology can be harnessed to advance the development and adoption of microinsurance as it can be used to process transactions from remote places at very low transaction cost (Faber, et al., 2014). The adoption of technologies in the insurance industry has lowered transaction costs and indeed premium charges (Cole, 2015). The adoption of mobile technology, as an example, has the power to reach more poor people at a fraction of the cost (Ime & Ikechukwu, 2017). These technologies can be effectively harnessed to improve communication, premium collection and claims handling.

3.7. Lower transaction cost

The high transaction, distribution and administration costs involved in serving remote dispersed customers in low-income markets in comparison to the low premiums charged renders the microinsurance value proposition unsustainable (Kumar, 2017; Koven & McCord, 2014). High transaction cost can limit the development of inclusive financial systems and hamper financial deepening. Microinsurers should find new ways of reaching the poor at minimal costs. The adoption of technologies, bundling of services and partnerships can lower the costs of serving poor communities in terms of distribution and administration costs (Apostolakis, Van Dijk, & Drakos, 2015). However, practitioners need to guard against the imposition of such value-added services on clients as they may bring about negative externalities if non-negotiable (Kwon, 2010).

3.8. Affordable premium

The concept of affordability is unclear or vague in economics theory (Niens, et al., 2012). Affordability is estimated using the ratio of expenditure to the household's total income or the residual income after an expenditure method. In both methods, the estimation of affordability assumes that households have some resources. However, in extreme poverty some poor households may have absolutely nothing (Jutting, 2003). Microinsurers should design policies with affordable premiums. The setting of insurance premiums requires comprehensive pretesting of affordability (Brouwer & Akter, 2010). Affordability of premiums is crucial to scaling up and out of microinsurance programs (Ahuja & Jutting, 2004). Reduction in price and simplification of the product is essential for product adoption (Donkor & Leftley, 2014). Risk management strategies can be used to reduce premiums to affordable prices through imposing policy limits, deductibles, and payables.

These also help to reduce the insurer's losses (Beiner, 2013).

3.9. Product knowledge communication

Increased knowledge about the function and benefits of microinsurance can improve demand. The use of peers who are benefiting from the product as well as those who experienced past shocks in acquainting other community members may increase uptake and renewals. Insurers need to use appropriate media channels such as television, radio, mobile phone text messages and visual posters (Subramanian, 2014). Increased financial literacy through targeted awareness campaign will pull customers to adopt insurance products (Savitha, 2014). This coupled with product simplification will aid the poor's understanding of the benefits of insurance policies (Kumar, 2017). Patt, et al. (2010) concluded that proper training of low-income customers might be required to educate them about insurance. Insurers may need to create information disseminating hubs around centers of influence to create awareness. These could be community role models, school administrators and other trusted leaders who may also be roped in to educate the need for insurance. Equally important microinsurance agents should be well skilled and knowledgeable about insurance. They should be ready to articulate the benefits of the service in layman terms (Leftley & Mapfumo, 2006) There should be a platform of engagement between agents and the served community to keep abreast with insurance learning (Tom & Selvam, 2010).

3.10. Building trust

The success of microinsurance hinges on the foundation of trust (Guiso, 2012). Patt, et al. (2009) proposes a comprehensive multi-faceted framework for building trust in insurance product; insurers and other value chain actors as well as capitalizing on community social capital. Insurance is a trust-based service, therefore, it is critically important to highlight that the insurer is financially sound by demonstrating a track record of settling claims (Subramanian, 2014). The use of trustworthy suppliers is also encouraged in order to pull customers (Devadasan, et al., 2010). Insurers should strive to build trust through transparent premium prices, benefits and claim processes. Claim procedures should be simplified to meet the education level of poor people. The value chain for microinsurance should meet the set-up of low-income markets while delivering quality service. A reputable insurer providing quality customers will help retain customers through policy renewals while driving sales revenue (Kumar, 2017). The low-income market is an experiential market that relies on touch hence insurance benefits should be more tangible (Matul, Dalal, De Bock, & Gelade, 2013). Insurers are therefore challenged to build trust through delivering on the promise and intimate engagements. They should ensure that claims settlement rejections are adequately explained to the customers. Pre-conditions for rejection should be set-out clearly to the market to avoid dejection and

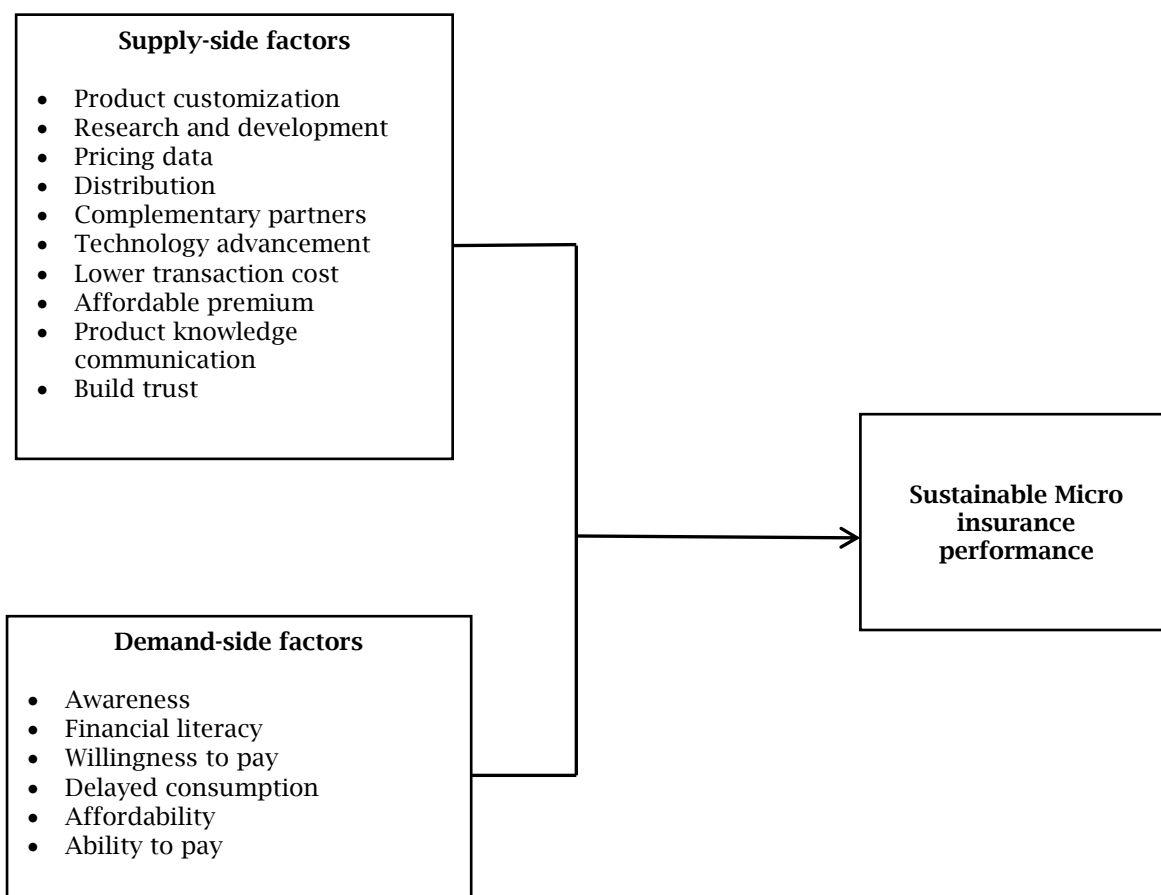
dissatisfaction. This is paramount as credible assessment mechanisms and maximum loss-compensation provisions can attract great numbers of clients (Abbas, Arujath-Badu, Kachele, & Muller, 2015).

4. A FRAMEWORK FOR INTEGRATING DEMAND AND SUPPLY FACTORS

There is a serious mismatch between supply and demand of insurance products in low-income markets. There is tremendous supply-side growth in microinsurance programs yet the demand-side adoption of the service is meagre leaving many poor families excluded from insurance (Biener & Eling, *Insurability in Microinsurance Markets: An Analysis of Problems and Potential Solutions*, 2012). The divide between demand and supply is a serious problem that needs management attention. In many organizations, the demand and supply sides of the business are often completely disconnected (Tate, Mollenkopf, Stank, & Da Silva, 2015). Integrating supply and demand is critically important to the development of the microinsurance sector (Cohen & Sebstad, 2006, p. 29). There has been a massive supply-side growth of the microinsurance market in developing countries despite poor uptake of the service (Biener & Eling, *Insurability in Microinsurance Markets: An Analysis of Problems and Potential Solutions*, 2012). The microinsurance industry is supply-driven yet in order to respond to the very needs of the low-income consumers, it should be demand-driven (Zeug, 2011). Kwon (2010) notes that policies offered to low-income people do not reflect their risks but services on offer. The existent mismatch in demand and supply of microinsurance policies requires coordinated integration of the two. Integration of supply and demand is integral to the development of the microinsurance industry. The current mismatch between the two inhibits the sector's full potential.

Proponents argue that a match between supply-side and demand-side creates sustainable value for the firm and its customers (Esper, Ellinger, Stank, Flink, & Moon, 2010). In support, Ime & Ikechukwu (2017) concur that the development of the microinsurance segment is hinged on a balanced delivery of demand, supply and regulatory frameworks. Dror (2007) observed that robust microhealth insurance, for instance, is provided when clients' health care needs are matched with the supply of health care. As discussed in section 5 and 6 the integration of the demand and supply side by microinsurers paying attention to the identified factors will help in the design of insurance policies that address the real needs of low-income people. The conceptual framework is as shown in Figure 1 where supply and demand factors are matched to result in a sustainable microinsurance performance which generates profits for the insurers which alleviating the risks suffered by low-income people. The framework attests to the need for microinsurance to be designed in such a way that it addresses both the supply and demand side of the business.

Figure 1. Conceptual framework for sustainable microinsurance performance



In the practical sense, microinsurers can integrate demand and supply through cause-related marketing strategies. Through this approach, business tackles a social problem such as poverty while creating value for the business (Espstein & Buhovac, 2010; Bento, Mertin, & White, 2017). Such approach creates dual value for the community and business. Zeug (2011) reports interesting and creative ways of linking microinsurance products with services of high priority to the poor. The author observed water and sanitation projects that were linked to health microinsurance or some specific disease like cholera-prone to the community. The take-up of the microinsurance is effective because it is linked to a service meeting low-income people's needs. This approach is linked to market creation effort which has already been alluded to in this paper. The associated project could increase income-generating capabilities which enable the beneficiaries to pay the microinsurance premium.

5. CONCLUSION

The paper reviewed extant literature on sustainable microinsurance performance. The key findings are that the performance of microinsurance is poor in low-income markets because there is an oversupply and low uptake of the service. Meanwhile, proponents of sustainable value creation argue that the lopsided mismatch between demand and supply in the microinsurance needs to be addressed. In response, the paper identified and discussed

demand-side and supply-side factors of microinsurance with reference to the low-income market context that needs to be integrated. The various factors are discussed insofar as they inhibit microinsurance and how they can be improved to drive microinsurance performance. The demand-side factors discussed inhibit the full participation of low-income customers. The paper argues that microinsurers would need to address these factors in order to develop a market for their services. In addition, the microinsurers need to devise reciprocal supply-side strategies that directly respond to demand-side factors that were identified in the literature to limit the growth and uptake of microinsurance services. In a nutshell, microinsurers need to build demand-side and supply-side strategies that not only speak to each other but are congruent with the context of the low-income markets. Anything devoid of that will hardly lead to sustainable development of the service. To encapsulate the study, a proposed conceptual framework that may be used to integrate demand and supply factors was presented. Sustainable performance management can be achieved by integrating and balancing the demand-side factors that help low-income customers to fully participate in the economic market while informing microinsurers of the supply-side factors that need to be adjusted in order to match the conditions of low-income customers. The adoption and application of the proposed conceptual framework can prevent service failures currently witnessed in low-income

markets. The study makes a contribution towards understanding factors that can lever microinsurance performance. It places the importance of integrating demand and supply of the service as a mechanism for sustainable performance. Even though the factors presented in this theoretical study are not empirically tested, they stress the importance of understanding the real needs of low-income markets and addressing them with appropriate demand-side and supply-side approaches. It is also evident that establishing a business market in the low-income segment requires creativity and additional corporate

effort to build a sustainable market for offered products. The offered products should also address pertinent needs that affect a huge critical mass of this peculiar customer group in order to build sustainable traction. Most importantly, the study emphasizes that microinsurers should take the initiative to address both the demand and supply sides in a balanced way in order to be successful in low-income markets. Further research may be directed towards empirical studies to test the factors discussed in this paper.

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