Positioning Co-operatives as Partners in Global Health Agenda: How to go about it in Africa

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Abstract

Promoting global health is a trending agenda in global development. Its achievement calls for the involvement of various stakeholders including co-operatives. As socially responsible member-based organizations, co-operatives in Africa are potential partners in promoting global health but there is a need to strategize best approaches for their involvement. This paper shares strategies through which co-operatives can, directly and indirectly, engage in the process. Guided by the theory of social suffering and theory of access, the paper applies an exploratory literature review approach to collect secondary data. Critical analysis of various works of literature have been done where 41 kinds of literature on co-operatives and global health were used based on a developed inclusion and exclusion criteria. A review protocol was used as a tool to guide the review with a focus on: health and demographic trends in Africa, options for co-operative model inclusion in global health, and the local and global cases. Further, consultations with stakeholders in co-operatives were done to collect evidence on local initiatives towards health issues. The findings show that different empirically proven strategies exist for co-operatives to engage directly and indirectly in promoting global health. The strategies include: establishing hospitalization services, providing health insurance, producing and supplying medical and nutritional products, operating mobile clinics, engage in health research and dissemination of health information, coordination of health service access and others. It is concluded that co-operatives can be direct and indirect reliable partners in promoting global health agenda in Africa. The paper calls for awakening the African co-operative movement, policy reforms and stakeholders' collaboration in mobilizing resources and investments for active inclusion of the co-operative model in global health agenda.

Keywords: *Co-operatives, health, global health, trends, strategies*

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INTRODUCTION

Good health is among the basic requirements for any human being to actively engage in development process within communities (Berthélemy and Thuilliez, 2013; Ruger, 2003; Mwabu, 1998) and increase one's

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enjoyment in life. Healthy people are more productive and promote economic growth (WHO, 2014). In recent years, there has been a growing concern towards promoting equitable and reliable health services, and the need to improve health conditions to the wider part of the population are undeniably shifting from national to global stage. This is further evidenced through the inclusion of good health and wellbeing among seventeen Sustainable Development Goals (SDGs) adopted globally in September 2015 (ILO & ICA, 2015; Kickbusch, 2016).

With such concern, it may generally be argued that global health initiatives should focus to address global health challenges including those in developing countries. These challenges include communicable diseases, non-communicable diseases and mental health problems, injuries, high mortality and morbidity rates (de-Graft *et al*., 2010; WHO, 2014). Further, there is an increase in counterfeit and low-quality drugs, short of well-trained medical experts, corruption and poor governance and regulations in health sectors, limited financing and technological challenge in the health sector (Armah-attoh *et al*., 2016; IFC, 2011; Kirigia & Barry, 2008). Also, there is a slow increase in life expectancy in the developing world, a long time in waiting for health care and high cost for health services (IHCO & Euricse, 2018). Like other parts of the developing world, the African continent is not immune to these health challenges and on average it lags in addressing various global health challenges compared to other regions in the world (WHO, 2014).

National governments and regional blocks in Africa have also been taking various initiatives to promote global health in their areas, mostly through collaboration with different local and international partners. These include adapting the Ouagadougou Declaration to address health system challenges (Kirigia & Barry, 2008), Moscow Declaration against tuberculosis in 2017, International Health Regulations (IHR) and Addis Ababa Declaration on Immunization (WHO, 2018b). Other adapted declarations are: the 2001 Abuja Declaration on HIV/AIDS, Tuberculosis and other related infectious diseases; 2012 Tunis Declaration on Value for Money, Sustainability and Accountability in the Health Sector; the 2014 Luanda Commitment on UHC in Africa; and the Africa Health Strategy 2016-2030 (World Bank, 2016). Others include Accra Declaration on Health Research for Disease Control and Development in 2006 and the Brazzaville Declaration on Non-communicable Diseases Prevention and Control in 2011 (WHO, 2012). Such efforts mainly focus on creating good health condition and wellbeing among people including addressing the spread of both communicable and non-communicable diseases. Further, African nations agreed to spend more for health services e.g. 7.2 percent of the budgets spent for health from 2000 to 2015, but still, the access to health services remains the main challenge for many citizens (UNECA, 2019).

Achieving global health has for years been confronted by limited resources to address various health challenges, especially to the poor and sick people (Garrett, 2007). From the review of literature on global health issues, it is evident that promoting global health should take a comprehensive stakeholders' involvement approach to create synergy (Garrett, 2007; IFC, 2011; WHO, 2014, 2018b). Such stakeholders include governments, international organizations, local civil society and other actors in the private sector. This will help to enhance equitable access to health services, conducting health research, promoting investment in health sectors, advocacy for health policy reforms. Further, the private sector plays a significant role in efforts towards attaining global health and in that case, one could expect those member-based organizations such as co-operative organizations to take an active part.

Even though there has been a clear call for multi-stakeholder engagement in promoting global health, yet less has been

revealed on how co-operative societies, especially in Africa can engage. As member-based business organizations, co-operatives are widely known for their role in promoting socio-economic development nationally and globally (Anania & Rwekaza, 2016). In that case, co-operatives can be among reliable partners in attaining global health agenda both directly and indirectly. In light of the call for multi-stakeholders' engagement in promoting global health, this study attempts to venture on revealing how best co-operatives can engage in this agenda both directly and indirectly.

Also the current evidence on growing importance of co-operatives in the health sector over the past 20 to 30 years, increasing demand for health services and challenges facing governments to extend heath (COPAC, 2018) create the need to understand how successful co-operative models worked and how such experiences can be learned by co-operative actors in Africa. Further, there is a limited number of co-operatives in Africa engaging in the health sector (Girard, 2014) despite a high demand for more promotional efforts for co-operative engagement. This paper shares experience on how the co-operative model can be applied in promoting global health in Africa based on cases from within and outside the continent. Specifically, the paper examines the trend and opportunities in the African health sector and demographic changes then strategize on some best options on how co-operatives can venture into promoting global health agenda. The paper contributes knowledge on how best co-operatives in Africa (and elsewhere) can engage directly and indirectly in attaining global health agenda. The strategies have been proposed based on practical experience from different global regions and conceptualization to shade light on what can further be done. Based on such experiences and theoretical perspectives presented, we believe that a foundation can be laid in the quest to attain a global health agenda through collective approaches including the use of the co-operative model. In this case, we expect this paper with further help to inform policy reforms in co-operative and health sectors, including responsible stakeholders on the essence of co-operative model in extending equitable and reliable health services and other efforts towards global health.

The remainder of the paper is organized as follows. We start with the theoretical review and conceptualization of global health in relation to co-operatives. We later proceed with the descriptions of the approach and methods followed by the findings and discussion accompanied by notable empirical cases from various countries. We end the paper by providing the conclusion and areas for further studies.

THEORETICAL REVIEW AND CONCEPTUALIZATION OF CO-OPERATIVES AND GLOBAL HEALTH

Theorizing Global Health

Kleinman (2010) argued that global health lacks collective batch of related theories hence needs several theories to explain it. Our paper draws from two theories namely: Theory of social suffering and Theory of access. In an attempt to theorize global health (Kleinman, 2010) extends social suffering theory as a means to provide a framework to explain it based on four aspects. First, the socio-economic and socio-political forces can lead to people's suffering including diseases. Second, the existing social institutions such as health care bureaucracies established to address such suffering may in other ways lead to more suffering. Third, pain and social suffering of given disorder don't only affect an individual but may extend to families and the whole social networks. The final argument is that social suffering removes the chronological division between what is referred as "health problem" versus "social problem" with the assumption that they both need serious efforts in policy reform to address them. In Africa, it is evident that prevailing socio-economic and political conditions such as income poverty, unemployment, political instability and wars, health budget limits and others significantly

limit access to health services and perpetuate disease and other health challenges.

Despite their efforts to enhance access to health services and wellbeing, prevailing health institutions are constrained with the shortage of health facilities and staff and sometimes demoralized health personnel, corruption, bribery and accessibility to such facilities hence extend suffering including disease burden. As all these sustains, families and communities get trapped into disease cycles and unhealthy living hence sustain suffering and affect their livelihood and even extend to other countries—see for instance, previous Ebola outbreaks in West Africa and deteriorating health conditions of civilians in war-torn countries like Somalia, South Sudan, Libya and in Darfur, Sudan. Therefore, in addressing health challenges in Africa, needs the involvement of various actors to create a synergy of resources and expertise and in reforming social and health policies. In such reform, it may include promoting more participation of private actors like co-operatives to help in extending health services and wellbeing.

To explain what leads to access of services, Penchansky and Thomas (1981) developed the theory of access. To them, access to services is determined by five factors, namely, accessibility (location), availability, acceptability, affordability and adequacy. In this case, people can access health services if such services are in a convenient location they can reach, getting required services and their perceptions to received services. Satisfaction is also important to one's decision to access and use of services (Penchansky and Thomas, 1984). Further, people need to be able to afford the services and get them in a full package as expected. Further, Saurman (2015) added another factor of "awareness" arguing that services can also be accessed if people are well informed and means of communication are in place to make them aware—e.g. location and quality of services, prices and packages related to such health services. In line with this theory, co-operatives can play part in enhancing access to health services to their members and wider communities. As member-based and socially responsible organizations, co-operatives in Africa are important players to be engaged in promoting equitable and quality access to health services directly and indirectly. As they engage in insurance, medical loans, production and distribution of medical and nutritional products, operating health care services, collaborating with other health stakeholders or operating as specialized health institutions, co-operatives can bring value to address global health challenges.

Our Theorization on Cooperation and Global Health

Our work acknowledges the key ideas from social suffering and access theories. However, grounding on the two theories we further theorize that at the end people in communities will likely take collective action to address limitations to access services including health. In this case, we visualize the theory of "collective option theory for limited-service access". We first argue that prevailing socio-economic and political conditions in Africa create suffering to people including disease burden limiting healthy living. Second, the efficiency in existing health institutions and bureaucratic processes limit equitable access to health services by the majority, including those covered by insurance schemes or with limited incomes. As similar sufferings persist, they affect other family members and extend to communities directly or indirectly hence create social and health problems. As they all persist, access to health services constrains people's livelihood. At this point, people with the same suffering or health burdens in the community can opt for self-mobilization and strategize on other options to gain access and relief. The options may include organizing access to services from other places, initiate their health services institutions and even work with other partners to enhance access. People are likely to opt for collective services due to existing

barriers to access such as distance to health facilities, costs of services, quality, and reliability and availability of information concerning the services. In our views, such collective efforts can take various approaches including the co-operative model.

Conceptual Framework: Positioning the Co-operative Model to Attain Global Health

In conceptualizing the role of the co-operative model in attaining global health, we envisage various components. These include: the existence of co-operative enterprise; the commitment to attaining SDG No.3 on Good health and wellbeing; prevailing global health challenges; the need for strategic approaches to address the challenges by co-operatives and the overall expected outcome of having Africa population with good health. The relationship between the three aspects is depicted in Figure 1. In achieving the expected results from implementing SGD No.3, there is a need for involvement of various global stakeholders (WHO, 2018c) including co-operative enterprises. As a socially responsible business, the co-operative enterprise can be reliable in promoting global health either directly or indirectly. Directly, co-operatives can take options such as establishing hospitalization and medication services (COPAC, 2018; UNFPA, 2015), mobile clinics (Voinea, 2019), forming co-operatives for medical personnel, producing and supplying drugs and other medical facilities, establish rehabilitation centres as well as partnering with the private sector in health service supply and engaging in community health programmes. Co-operatives can also engage in the provision of health insurance services (ICA, 2019; ILO, 2001). The indirect options may include coordination of health service access and distribution of pharmaceuticals and other medical supplies locally and internationally (Girard, 2014), engaging in health advocacy and provision of health information and education to communities and the general public (Tobore, 2018). Co-operatives can also engage in health-related research works (IHCO and Euricse, 2018). We further assume that once such strategies are widely adapted and scaled-up, health challenges in Africa will be minimized to a greater extent hence health status and practices among people will be attained therefore the global outcome attained. However, these can be attained if there is supportive co-operative and health policies and laws, resource availability, the readiness of other development partners to join co-operative efforts as well as strong management and innovation capacity in co-operative enterprises.

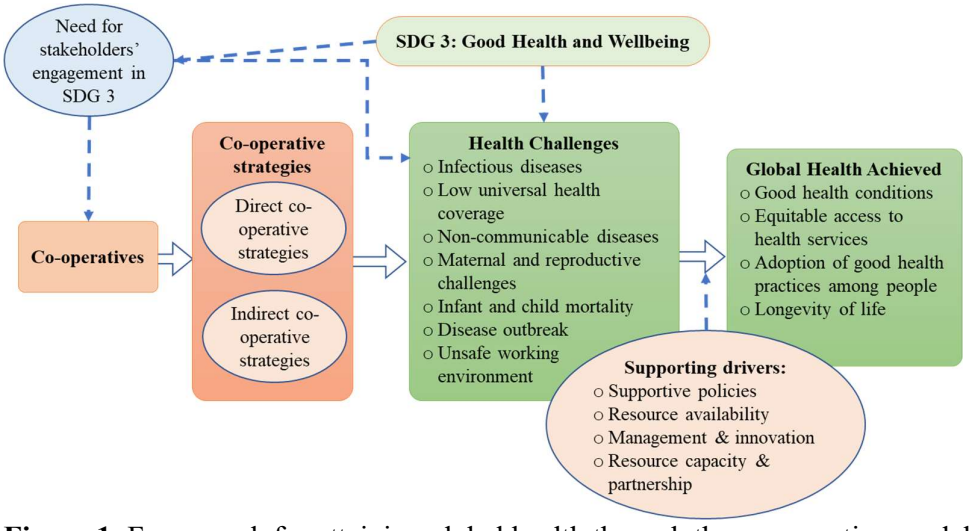

Figure 1: Framework for attaining global health through the co-operative model

APPROACH AND METHODS

In writing this paper, secondary data from various kinds of literature have been used. We made an intensive search of online materials from different websites and databases to acquire different kinds of literature in the study of co-operative and (global) health as keywords of concern. The interrelationship of the two aspects was the main focus in search of the literature. In terms of coverage, the materials reviewed were from all global regions. Since the paper is more exploratory and descriptive, the approach of the review used was an exploratory literature review. This enabled us to find out the exact issues existing in the academic literature in terms of practices and empirical shreds of evidence about co-operatives and health issues. It also enabled us to sharpen our prescribed strategies on co-operative involvement in global health and our focus in building cases. In the findings and discussion part, a total of 41 primary and secondary literature have been reviewed. The reviewed primary literature were institutional reports, conference proceedings and web-based literature related to this paper. The secondary literature included books, book chapters, and journal articles. The rigour of the literature used was determined by disciplinary context, the professionalism of the authors, and the institutional literature and the reputation or authority level. The inclusion and exclusion criteria of the literature were developed. The inclusion criteria included type of data and information needed, the language of the literature (being English), time frame (from 2010 to 2020), and diversity of literature (primary and secondary literature). The literature that didn't directly relate to this paper were automatically excluded during the review.

In collecting data from the literature (numeric and qualitative), documentary review protocol was used as a tool to guide the review process. The tool consisted of various themes related to the paper i.e. health issues and demographic trends in Africa, the opportunities in health sectors that may be capitalized by co-operatives, viable strategies for direct and indirect involvement of co-operatives and cases from various countries where the co-operative model has been applied in promoting good health. In analysing reviewed materials, the critical (integrative) analysis of the literature was done. The reviewed materials were assessed and conceptualization was done to create perspectives through which co-operatives can engage in global health agenda as intended in the discussion of this paper. In some cases, phone call enquires have been done with co-operative staff and Co-operative officers to seek information or justify some evidence on co-operative involvement in health service support, specifically in Tanzania. The gathered data and information from various sources have been presented descriptively.

RESULTS AND DISCUSSION

Health and Demographic Trends in Africa and the Opportunities for Co-operatives

Health challenges in Africa can be viewed from multiple angles including that of population characteristics (birth rates, mortality and ageing) and prevailing health systems and accessibility by the majority. The disease burden, increasing threats of non-communicable disease, low health insurance cover, risk working and living environment and shortages of health staff and facilities are all contributing significantly in sustaining global health burden in the continent (de-Graft Aikins *et al.,* 2010; Kirigia & Barry, 2008; WHO, 2014). The burden of disease in Africa comprises mostly of communicable diseases followed non-communicable diseases e.g. prenatal conditions, respiratory problems, malnutrition, maternal conditions and neuropsychiatric disorders as well as injuries (WHO, 2011; 2014). Sub Saharan Africa carries about 24 percent of the global disease burden and has less than one percent global expenditure in health (IFC, 2011). Other challenges include poverty, limited accessibility and quality of health services (UNECA, 2019), especially in rural areas.

Though the above studies show significant improvements in addressing health challenges in Africa over the past decades, more efforts are needed to bring different actors in the process and this may include promoting co-operatives in the health sector. As indicated in Figure 2, the African population has increased from 478 million in the 1980s to current 1.2 billion people, at an increasing rate of 2.5 percent annually. It is estimated to reach 1.5 billion people in 2025, 1.9 billion in 2045 and 2.4 billion in 2050 (Ouedraogo, 2007; UNECA, 2016). The growth in population has implications in costs to invest in enhancing access to health services. This calls for actors in public and private sectors to utilize the opportunities to invest in health services to accommodate the needs of the growing population.

This population increase and rapid urbanization demands for improvement in the health system and investments to address emerging health challenges (AfDB, 2014). Despite the efforts committed and observed improvements, teenage pregnancy and the infant, child and maternal mortalities remain the serious challenge in most of the African countries (UNECA, 2016). The average life expectancy at birth has increased from 57 to 58 years in 1990 to 2011 (AfDB, 2014) and reached 60 years in 2015 (WHO, 2018a). Also based on World Population Prospects of 2019 by World Bank, life expectancy in Africa is expected to be almost 63 years by 2020, 64 years by 2025 and 65 years by 2030 (UNdata, 2019). The trend in life expectancy is presented in Figure 3. Despite the current improvement, yet by the country-specific still a large number of African nations has life expectancy below 60 years and the average at the continent level is lower compare to other world regions (UNECA, 2016).

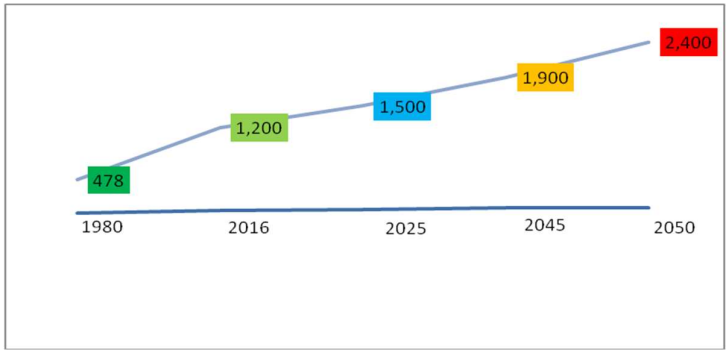

Figure 2: Demographic trends in Africa (in "000,000")

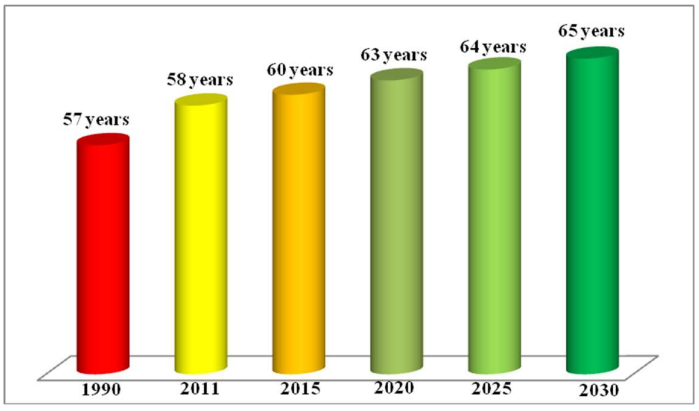

Figure 3: Life expectancy projections in Africa from 1990 to 2030

In these trends indicate the need for more investments in the health sector including health care, insurance, pharmaceuticals and nutritional products and community health programmes to meet the needs of maternal women, under-five children, elderly and general public. More investment in health care for aged people is likely to increase in Africa as life expectancy level increase shortly. Again, despite the decline in crude death rate in Africa at around 43.1% by 2015, still, some countries have high crude death, including Niger, Mali, DRC Congo, Central Africa and Burundi and generally Africa has high adult mortality than other regions. Maternal Mortality Rate (MMR) is declining but at a very low pace compared to other areas e.g. MMR in Africa 34 times higher the MMR in Europe. There is also a shortage of medical staff including those with reproductive care expertise hence affects the speed to combat infant mortality. In 2015 for instance, only 54% of women were attended by skilled health workers. Child immunization coverage is also low in Africa compared to other regions, for instance, pentavalent vaccine (Penta 3) cover is 74% compared to the global target of 90%. Further polio vaccination has not reached 80% yet while still some nations such as Guinea, Equatorial Guinea and South Sudan have rates below 50%, putting more children at risk (WHO, 2018a). These indicate the need for scaling up efforts to combat mortality rates, increase the supply of medical personnel, vaccination programmes and other care for women and children.

For decades in Africa, efforts to promote global health focused on combating communicable diseases such as HIV/AIDS, Malaria and Tuberculosis. HIV/AIDS rates have been declining but still the infection rate stayed 4% for years compared to the rate of 0.1 to 05.% in other regions and 76% of HIV related death globally were from Africa in 2016. Deaths from malaria and tuberculosis are declining but remain high compared to other parts of the world (IHME, 2013; WHO, 2018a). In 2015, malaria, HIV/AIDS and tuberculosis consumed the lives of about 1.6 million Africans (Pheage, 2017). Recently, there has been a significant increase in non-communicable diseases (NCDs) such as cancer, stroke, depression, cardiovascular and chronic obstructive pulmonary diseases and diabetes in Africa, which also lead to increased death rates (AfDB, 2014; Airhihenbuwa & Ogedegbe, 2015; IHME, 2013; Marquez & Farrington, 2012). Further, other emerging health challenges include lungs problems due to tobacco use, obesity and overweight, excessive alcohol consumption, road traffic injuries and mental illness (WHO, 2018a). The number of people with disability is also high in Africa than other continents, currently at around 80 million. Some reasons for the increase are; poor nutrition and injuries, traffic accidents, environmental hazards, domestic violence and civil wars (IHME, 2013; UNECA, 2016). Africa, mental health problems are also poorly attended and the average mental health staff is 1.4 per 100,000 people compared to a global average of 9 staff per 100,000 people (Sankoh *et al*., 2018). All this implies that Africa needs to put more effort in addressing disease burden from communicable diseases and NCDs, health care for disabled people, improve work environment and infrastructure to reduce injuries and accidents and mental care.

African children population is currently over 580 million but projected to increase by 170 million between 2016 to 2030 (Anthony *et al*., 2017) hence influence the need for more investment in health care. Natural calamities like drought and floods contribute to diseases spread and affect people's health and even leading to deaths in Africa especially (Ncube *et al.*, 2013). Further, the limited capacity of governments to offer health services to all citizens has created more burdens to people. For instance, in 2014, out-of-pocket spending on health was

USD 38 per capita, an increase from USD 15 in 1995 (UNECA, 2019). This may also be due to low health insurance coverage to low income and informal sector citizens (Fenny *et al*., 2018; ILO, 2014). Private sector including co-operatives is needed to invest in health insurance, hospitalization and medical supplies (Anania & Bee, 2018) as well as adaptation measures against environmental challenges. Generally, these health and demographic trends in Africa call for more investment in health care, insurance, pharmaceuticals and nutritional products and community health programmes, environmental management, improvements in working environment and infrastructures and others to meet the health needs of the population and co-operative model can be brought on board in such efforts.

Strategies for Promoting Global Health in Africa Using the Co-operative Model

The co-operative business model in Africa can take part in promoting global health both directly and indirectly using various strategies. The proposed strategies have based on conceptualization from literature and theories in an attempt to describe mechanisms of enabling people to access health services through co-operative action as part of initiatives to realize the global health agenda. Such strategies are discussed hereafter.

(i) Direct options for co-operatives to engage in the health sector

Directly, the following strategies can be applied in the efforts to promote global health in Africa through the co-operative business model:

Establishing co-operative based hospitalization and medication services: The co-operatives in Africa can engage in promoting global health agenda by establishing hospitalization and medication services. This can be done through co-operative members establishing hospitals, health centres and clinics/dispensaries to offer such services and operate them through the co-operative business model (Anania & Bee, 2018). There can be investments in medical laboratories. The approaches to this strategy can either be members mobilizing their resources to build such health facilities or allocate part of their business surplus to invest in the construction of either of these health facilities in their areas or collaborate externally to acquire required resources. In Cotonou, Benin for instance, Sikecoudji co-operative clinic formed partly with external support has been offering key services like post-natal, sonogram and other maternal care to women surrounding communities (UNFPA, 2015). The health facilities can also specialize to a certain type of patients (like children, elderly, disabled and mental people) or be general to all people e.g. Japan federation of health co-operatives (HeW Co-op) with health care institutions including those for elderly (COPAC, 2018). Once formed, health care co-operatives can offer discounted services to members and dependants. E.g. National Health Co-operative (NHC) in Canberra, Australia charges a monthly membership fee of USD 10 allowing members to get 50 percent discount of medical costs and free medical care for their children under eighteen years (National Health Co-op, n.d). Co-operatives can further operate nationwide as done by Unimed co-operative network in Brazil, which has 354 health co-operatives serving over 20 million people. In the formation process, the mechanisms for financing, staff requirements and payments and type of health services to be offered need to be well articulated.

Initiating and operating mobile health clinics: Recently the approach to offer medical and consultation services to clients have been changing including the use of mobile clinics, especially in remote communities. Such initiatives help to increase health service coverage to a wider population. Therefore, with a large part of

Africans (about 70%) living in rural areas where access to health services is limited, mobile clinics by co-operatives can be useful. The clinics can be operated through structured vehicles where various medical facilities and experts can be accommodated. Some notable global cases of the model include the Umbrella multicultural co-operative in Canada which operates mobile clinic services to foreign farmers and immigrants (Umbrella Multicultural Co-operative, n.d). In Australia, Budja Budja Aboriginal Co-operative operates mobile clinics to offer health services to geographically disperse aboriginal families (Budja Budja Aboriginal Cooperative, n.d). In Timor, a coffee co-operative named Cooperativa Café Timor operates a mobile clinic to offer health care to its members and their families since the year 2000 (Voinea, 2019). The clinics can also be done through medical camps for health experts to settle in a designated location where people can access for getting health services. The mobile clinics can be operated by members of health care co-operative with a medical background or by any type of co-operative that may hire professional staff. The strategy can also help to extend services for the elderly and people with disabilities (PWDs). Other local mobile care innovations like camel and motorbike mobile clinics in Kenya can be used as alternatives (Oyaro, 2017).

Engage in health insurance services: There is an increasing demand for more health insurance cover to a wider part of the population in Africa countries and globally hence different insurance schemes in public and private sectors have been established. The national health insurance schemes operate in various Africa countries including in East Africa e.g. National Health Insurance Fund in Tanzania and in Kenya, all focusing on civil servants. Other public schemes operate at grassroots mostly dealing with low-income people e.g. improved community health fund (iCHF) in Tanzania (Lee *et al.*, 2018). The number of private entities in health insurance is growing in Africa, but a still large part of the population is not covered. This gives room for co-operatives to engage in offering health insurance coverage to its members and the general public. This can be done in various ways as follows. First, co-operatives of all types can have health insurance as among their products to offer to members. Second, they can offer health loans; third, they can establish health insurance services independently or jointly with other partners in the public and private sectors. For instance in Tanzania, the Kilimanjaro Native Co-operative Union (KNCU) Ltd in Tanzania once operated health insurance to its members in primary co-operatives where each member contributed specific amount from coffee sales to cover insurance needs annually.

Again the savings and credit co-operatives (SACCOs) in various African countries have health insurance products and sometimes medical or emergency loans to facilitate members' access to health services. The Co-operative Private Partnership (CPP) model can also be used to engage in health insurance e.g. the Co-operative Insurance Company (CIC) in Kenya which operates in Kenya, South Sudan, Uganda and Malawi is 76% owned by co-operatives in terms of shares and comprise two-third in the Board structure (ICA, 2019). African co-operatives can further learn of internationalization of insurance business from others such as International Co-operative and Mutual Insurance Federation (ICMIF) operating in 16 countries globally. Insurance can also extend to other issues e.g. life and accident insurance as done by Folksam co-operative in Sweden or offer health insurance to members of other co-operatives as done by some health care co-operatives in Spain, Sweden, USA, Panama and Canada (ILO, 2001). For co-operatives to engage in health insurance, they need to make a feasibility study to identify

resources requirements, market segments and consumer data plus other requirements for such business.

Engaging in the production and supply of pharmaceuticals and nutritional products: The co-operatives in Africa can promote global health by engaging in the production and supply of pharmaceuticals and nutritional products. The presence of limited investments in pharmaceutical industries, low distribution capacity and the rapid increase of counterfeit and low-quality drugs in Africa (IFC, 2011) provide a gap to be filled by other actors including co-operatives. The growing population of children and infants in the continent need assured supply of medicines and nutritional products to promote their health and wellbeing. Pheage, (2017) revealed that Africa imports about 70% of its pharmaceutical products while only 2% of drugs consumed are manufactured locally. Further, from its 54 nations, only 37 of them have some indigenous pharmaceutical production. The investments in pharmaceuticals and nutritional products can be approached through; direct investments by health professional co-operatives or by share investments in existing or prospective pharmaceutical and nutritional products firms. Co-operatives can also produce existing medical products under license. Co-operatives in pharmacy or distribution business can be used in selling or distributing medicines and nutritional products in retail and wholesale stores and in humanitarian programmes to supply medicines, foods and supplements to starving populations. This can help to reduce unregulated medicine and other health supplies to the communities (IFC, 2011). Other types of co-operatives can also engage in either of these as part of business diversification strategy.

Engaging in community health programmes: The co-operative model in Africa can be used in implementing various health programmes for protecting, improving and maintaining health conditions in communities. Medical specialist co-operatives or other types may coordinate awareness creation campaigns on health issues such as disease control, hygiene and environmental care, nutrition and immunization. For instance, Public Health Concern Trust in Nepal (Phect Nepal) provides health care, engage in community health programmes and other services to rural people. In Trinidad and Tobago, social workers' centre co-operative society (SWCCS) provides home care and wellness programmes for members (Matthew, 2017). Specialized home care co-operatives are needed in Africa to serve to elderly, PWDs and mentally challenged people through home care programmes. In Singapore, some health community co-operatives operate centres for health wellness, home and elderly care services, retail pharmacies and dental clinics among others. In Rwanda, Tubusezere co-operative has been offering health care, education and treatment to women living with HIV/AIDS since 2012 (COPAC, 2018). Further, increasing challenge of non-communicable diseases and disorder like diabetes, high and low blood pressure, overweight and obesity creates a need for deliberate efforts to address them (Narayan & Donnenfeld, 2016). These may include establishing physical fitness programmes (like community gyms, marathons, walkathons, and jogging), education sessions and events on healthy living as well as social and mass media campaigns. These are also opportunities for youth to mobilize themselves and operate physical fitness and sports centres and other community events through the co-operative model. Further, efforts are required to address cultural practices e.g. female genital mutilation (FGM), early/child marriages, spouse inheritance, food taboos and others with a negative impact on community health. Financial education to members and

communities on the use of incomes to meet health needs should be emphasized.

Formation of specialized health co-operatives: The co-operative model in Africa can help to promote global health by establishing specialized health care co-operatives where health professionals as members can operate the business to extend community access to health services. For example, in Lesotho, the Village Health Workers Co-operative Society delivers primary health care to the villagers organized through savings and credit scheme (COPAC, 2018). Health care co-operatives can be operated in various modalities. In this strategy, members can establish their health care facilities (hospitals, dispensaries, laboratories, clinics or health centres) offering services such as hospitalization, medical checkups, consultations and medication. In this they can even specialize in a certain segment as done by health care co-operatives like Lavinia and Autogestio Sanitaria in Spain which focus on family health care (ILO, 2001) as well as Mama Co-op in Uganda and Women's Health Co-operative in Nepal, specializing on women health services (Girard, 2014). Co-operatives can also engage in the production and distribution of pharmaceutical and nutritional products targeting a specific market segment or whole population and operate the services in partnership with other private and public hospitals. Health care co-operatives can also be useful in offering services to people during calamities like disease outbreaks, earthquakes, civil wars, floods and famine and in help in refugees' management programmes. People can further engage in offices and households cleaning business especially in urban areas as done by Eco-Friendly Cleaning Co-op Network in the USA (Dastur, 2012) or operate one-stop-shop for people with special needs as done by Frail elder one stop shop in Rotterdam (KPMG, 2019). Moreover, the formation of burial service co-operatives may be used to handle burial services during the breakout of epidemic diseases like Ebola and Coronavirus hence reduce contamination risks to living people.

Supporting community health services as part of social responsibility: Co-operatives are a socially responsible business with an obligation to support community development as stipulated in the seventh (7^{th}) ICA co-operative principle on "concern for the community". They must allocate part of the business surplus to support development in areas they operate. On this basis, African co-operatives can contribute to global health by using part of a business surplus and other incomes to support the availability of health services in their communities such as funding purchase of medicines and other medical equipment, construction of hospitals, clinics or health centres and community health programmes. In Tanzania for instance, co-operatives like Uru East and Mruwia Joint Enterprise Ltd has been active in financing construction and renovation of local dispensaries and water supply in schools within the community (Anania & Towo, 2016). Other examples include the savings and credit co-operatives e.g. staff of TANESCO SACCOs revealed to have donated bed sheets and mattresses in some public hospitals in Dar es Salaam in the past two years. Also the inquiry from District Co-operative Officer in Hai district, Tanzania revealed that co-operatives in the area donated a total of TZS 358 million in 2019 for construction of district hospital. In Japan also, agricultural co-operatives established welfare associations to operate hospitals, clinics and insurance services to poor farmers who previously had limited access to health services due to lack of social insurance (ILO, 2001). Further, investment in training institutions like medical/ nursing schools can be done through the co-operative model in Africa.

(ii) Indirect options for co-operatives to engage in the health sector

On the other side, efforts to promote global health in Africa can be indirectly undertaken through the following strategies:

Logistical coordination and distribution of pharmaceuticals and nutritional products: The distribution of medicines and other pharmaceutical products in Africa is largely done by state-owned institutions e.g. Medical Store Department in Tanzania and National Medical Stores in Uganda. There is a challenge in distribution drugs and other medical facilities, especially in rural Africa. Health co-operatives and those in the transport sector can engage in logistical coordination and distribution of pharmaceutical and nutritional products hence ensure access to quality, affordable, safe and efficient medicines to people as done by Ghana Co-operative Pharmaceuticals Ltd in Ghana. Co-operatives can also operate as agents for private firms and state-owned enterprises dealing with pharmaceutical and nutritional products to extend distributions. Pheage (2017) argued that the presence of poor transport infrastructures, limited storage facilities, bureaucratic systems and poor procurement practices in government lead to poor supply, high cost or unavailability of drugs in Africa. Large pharmacy co-operatives can be used for bulk purchase of medicine and medical equipment for sell to primary pharmacy co-operatives at discount prices as done by secondary pharmacy co-operatives in USA and co-operatives like Cooperativa Esercenti Farmacie in Italy (ILO, 2001) and Association of All Pharmacists Cooperatives (TEKB) in Turkey (Girard, 2014). Further, health co-operatives can help in logistical coordination and other services for other hospitals and clinics as done by Rural Wisconsin Health Co-operative in USA owned by 20 rural and one urban hospital which provides them with operational support such as bulk purchase and common services (ILO, 2001). Transport and supply co-operatives can do the distribution of medical and nutritional products for other firms locally and internationally. Capital requirements, expertise, commission payments mechanisms from partner, legal aspects governing business arrangements and insurance of goods should be studied.

Coordination of health services and information access by the population: The co-operatives can also help access to health services and information to communities. This can be done by medical/health care co-operatives and co-operatives in information and communication technology (ICT) sector by coordinating patients' appointments with medical staff in various hospitals locally and internationally. There is a growing demand for Africans travelling abroad and within seeking for medical services e.g. annually about 18,500 Nigerians travel abroad for medical care (IFC, 2011) but face a challenge in getting appointments with doctors, accommodation, flights booking and other requirements. The ICT co-operatives or other types can be used to ease access to information and other travel requirements for members and other people. Also, the presence of health co-operatives Africa can help to reduce treatment cost for Africans from countries seeking treatment (Tobore, 2018). Health information can also be disseminated through the website, printed media, social media and emails to members and the public. In Tanzania, information for vaccinations and disease control campaigns has been channelled to grassroots in different ways including co-operatives. Health data co-operatives model can also be used to collect and disseminate various health data to the population (Hafen *et al.*, 2014:Van Roessel *et al*., 2018). Growing technologies like e-medicine and telemedicine can also be operationalized using the co-operative model. Co-operatives can work with health insurance firms to coordinate access to insurance cover for their members e.g. in

Tanzania, agricultural co-operatives help in promoting and coordinating access of *Ushirika Afya* (co-operative health) insurance offered by the National Health Insurance Fund to their members. Ambulance operators' co-operatives can be formed to address medical emergencies and deliveries including rural communities as done by *La Coopérative des techniciens ambulanciers du Québec* in Canada (COPAC, 2018). Further, traditional medical tourism is an emerging opportunity that can be used by tourism co-operatives in Africa as a product. Moreover, co-operatives can help in advocacy campaigns and activities aiming at promoting public awareness of various health issues and reforms of health policies, laws and regulations.

Co-operatives involvement in health research and dissemination: The co-operatives can further support achieving global health in Africa by engaging in research activities and dissemination of research findings related to health issues to the public. Such research works can be done by health co-operatives or in collaboration with other experts to address health challenges and promote good health practices. Other types of co-operatives can also allocate part of their surplus for community support to finance health researches in their areas. Further, health and non-health co-operatives can cooperate in disseminating health research findings and other information to their members and wider communities to help in promoting healthy living through mass media, online platforms and printed materials. The strategy can be learned from the Japan Institute of Rural Medicine which conducts research and dissemination on farmers' diseases and accidents. The institute is part of Saku Central Hospital (SHC) ground owned by agricultural co-operatives (IHCO and Euricse, 2018).

CONCLUSION

Generally, the African continent is faced with numerous health challenges making it difficult to fully attain global health targets and affect active citizen participation in the development process. In addressing global health challenges, the African national governments and the international community realize the need for multiple stakeholders' engagement in efforts to attain global health. Co-operatives become among the viable stakeholders that should be taken on board in these efforts. Based on Africa region and global experience, it has been proved that despite its operation in different health care systems the co-operative model is highly reliable in attaining global health agenda both directly and indirectly. However, these experiences should be scaled up and accompanied by favourable policy environment, financing and human resource bases for co-operatives engagement in global health promotion. Further, we hope that this paper will lay a foundation for scholars and practitioners and policymakers and implementers in co-operative and health sectors to realize the significance of the co-operative model in efforts to promote global health.

AREAS FOR FURTHER STUDIES

This work provides the foundation on empirically proven and hypothetical strategies through which co-operatives in Africa can be involved in achieving global health agenda both directly and indirectly. Our work is purely based on empirical works from different global regions to build cases for our discussion. We understand that more can be done in the areas we have written about. In our view, we invite scholarship in different areas as follows. First, there is a need to conduct an intensive survey to study various initiatives by co-operatives in Africa concerning health issues. This will help to understand their operations and issues to be addressed to improve their performance. Second, provided that co-operative

engagement in health issues is governed by different legal and regulatory frameworks (i.e. health and co-operative laws, policies, regulations and supervisory institutions) then there is a need to initiate a study on the proper approach for the establishment, organizational development and diversification for co-operatives venturing into health issues in line with the two frameworks. Third, we propose more studies on the appropriate ways for co-operatives, in collaboration with private investors, to undertake investments in the health sector. Further, mechanisms for internationalization of co-operative operations in provision of health services through co-operative to co-operative collaborations or direct foreign operations by local co-operatives can also be studied. In all these proposed areas, there is a need to study them while taking into consideration the type of health services to be offered, approach in operating the proposed co-operative business, prevailing policy and legal framework of a given country, nature of target market for the services and required core competencies for the proposed co-operatives organizations.

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