

Our Village – creating endogenous growth

Migration from Africa to Europe is unlikely to slow down, unless major driving forces are taken into account. Our authors address insufficient economic growth in rural Africa as a primary cause and introduce an innovative concept to stimulate endogenous growth in targeted communities. Developed in cooperation with interested traditional authorities in rural Cameroon, the concept combines cultural, social and economic aspects.

By Günter Nooke and Sarah Zeller

Insufficient economic growth in countries of origin is considered as one of the primary causes of migration from Africa to Europe. Even though it has been addressed with much effort for seven decades, especially rural areas in many African countries lag behind growth expectations, resulting in rural to urban and international migration. Instead of focusing solely on economic elements, we propose a concept which combines cultural, social and economic aspects. We focus on four core challenges:

- Rural areas are subject to seasonal fluctuations, with limited liquidity during some seasons.
- Rural areas generally lack funds since central government allocates little and local authorities lack communal income.
- Community driven development (CDD) committees undermine traditional authorities.
- Lack of transparency enables elite capture of funds and decreases trust in government.

We propose a solution with four components to address these challenges at community level. Bringing together traditional structures and cutting-edge technology, it promises to reduce poverty and strengthen social capital, and may be scaled up to a world-wide level.

A community currency to create additional liquidity

In rural areas, especially in sub-Saharan Africa, income fluctuates seasonally. A majority of the population are employed in the agricultural sector, earning their income once a year during the harvest season. This causes a seasonally high liquidity which decreases as income is used to buy external supplies (e.g. fertilisers) during the following seasons. As liquidity declines, a seasonal lack of liquidity accrues. However, there is no decline in the supply or demand of goods and services. This leads to an imperfect allocation where excess



M-Pesa payment in Kenya by mobile phone. Community currency payment based on blockchain technology ensures transparency.

Photo: Jörg Böthling

supply cannot meet excess demand because of insufficient liquidity.

Conventional means for extra liquidity are, however, either not available or inefficient. The poor rural population in need of credits does not have enough access, while micro-credit institutions draw on cash reserves and only facilitate a re-distribution of existing resources. A community currency, on the other hand, provides a constant means of additional liquidity. Restricted to a geographical area, it does not become scarce and can act as a loan without interest, transferrable to any other member accepting the community currency. While usually not convertible, it can complement another currency.

A community currency appears to have the most impact when addressing an actual need for additional liquidity. In the Global North, few people use currencies such as the Chiemgauer (Germany) which replace official currency without evidence of a significant economic impact. In the Global South, however, currencies create an emergency market when official currency fails to meet citizens' needs. Argentine Red de Trueque improved the economic situation for almost half its community members, while Kenyan Bangla-Pesa

accounted for 22 per cent of the networks' daily commercial interactions within a week of its introduction.

In the long term, the usage of a community currency increases when income is low and decreases when it is sufficiently high to cover members' needs. The counter-cyclical effect lowers sales volatility and provides a more predictable income. Members may also cover production costs and daily needs within the network. The resulting savings increase members' liquidity in conventional money. The community currency thus favours B2B transactions promoting commercial interactions within the network. However, if supply significantly exceeds demand or vice versa, the network stops functioning efficiently. Ensuring this equilibrium within the network, a community currency potentially leads to a virtuous cycle of increased income, consumption and production.

A community fund to increase local funds

Domestic resource mobilisation (DRM) is key to local development. Unlike Official Development Assistance (ODA), it correlates

significantly with a country's economic growth and creates a social contract between citizens and government. Spending DRM in the same region in which it was acquired appears to be sensible, since trust in institutions and their effectiveness in providing public goods and services is low. This measure can boost a feeling of accountability to local populations and promote the population's scrutiny of expenditure.

In rural Cameroon, central government fails to supply adequate access to vital public goods and services; in the most recent Human Development Index, Cameroon ranked 153rd out of 188 countries. Government spending on rural development is low and does not show significant results. A community fund – to which members of a community currency contribute – can improve the supply of public goods and services at local level. Governed by locals accountable to the members, the fund can realise measures and projects benefiting the community.

Since management knows the community's needs intimately and is obliged to use the fund exclusively to address these needs, measures can be tailored to actual local needs. This increases the population's feeling of ownership. As funded projects are implemented within the contributing community, results are directly visible. Consequently, contribution and personal profit are more readily connected and the advantages of contributing more evident. Aversion to taxes may be decreased and government may also benefit from efforts to increase DRM.

Cooperation with traditional authorities to boost effectiveness

Giving control over funds to a managing group frequently enables it to misappropriate these funds ("elite capture"). In the development cooperation context, one approach to avoid this phenomenon is to externally authorise a committee (Community Development Association, CDA) instead of local authorities to assume a management role. The newly-founded CDA has little legitimacy and is usually not accountable to central government; neither is it monitored by the local population. Traditional authorities, on the other hand, have the long-standing legitimacy to impose new measures, even if these are only beneficial in the long run. However, they do not have the necessary funds to implement development measures. This discrepancy between two different sorts of authority may lead to social unrest.

Involving local authorities from the onset of the project ensures a strong advocate. Using existing structures which have grown over time and gained legitimacy within the community also reduces organisational efforts and ensures local knowledge and legitimacy from the start. Considering the risk of elite capture, managers and local authorities nevertheless need to be closely monitored and directly accountable to contributors.

Using blockchain technology to increase transparency

Corruption and a lack of transparency are major concerns in Cameroon. Anti-corruption laws are insufficiently implemented, impeding the government's ability to provide basic public goods and services needed for further economic development. On a macro level, corruption negatively correlates with economic growth. At local level, elite capture is facilitated through a lack of transparency and decreases trust in institutions.

Blockchain technology provides a framework to tackle corruption and increase transparency. Recording transactions in a decentralised manner, this technology ensures transparency on every performed transaction. Since transactions are verified by every member before they are saved, records cannot be changed afterwards, providing a tamper-proof data base. Blockchain technology may also increase trust within the network as members see that others are observing the rules. Adding to social pressure within the dense network of a village business community, corruption becomes unlikely as any member abusing the system can be held directly accountable. However, with widespread corruption, a number of people profit from the current lack of transparency. Major profiteers inside the community may therefore oppose the introduction of a transparent currency vigorously.

The implemented, blockchain-based community currency needs to be easy to use, without knowledge of numbers or reading skills, since part of the adult population in Cameroon is illiterate. An Unstructured Supplementary Service Data (USSD) code-based implementation ensures that non-smart phone users can participate. Using combinations of numbers, asterisks and hashtags (e.g. *101#), conventional phones can be used to navigate through a USSD-based menu and authorise payments. This technology is already widespread as it is used to re-charge phones or transfer money with systems such as M-Pesa in Kenya.

Unlike a paper-based currency, designing and printing tailored bills is not necessary with blockchain technology, eradicating significant up-front costs. Scientific monitoring, which is indispensable for assessment of the currency's impact, is facilitated by complete disclosure of all transactions; data security can be ensured with anonymisation of transactions. Scaling the project up and replicating it in other communities is viable and fast since the required technology already exists. In the long term, trading between communities can be facilitated as conversion between different community currencies and is easily implemented. The potential use in hundreds of thousands of villages can create a commercial business or banking model for the upcoming platform economy.

Bringing together traditional structures and cutting-edge technology

Within this framework, social and economic factors of a traditional village are combined under a traditional authority to stimulate endogenous growth and social cohesion. The concept has been positively evaluated by Deutsche Gesellschaft für Internationale Zusammenarbeit (GIZ) in cooperation with traditional authorities of five communities in rural Cameroon. A pilot project is expected to be implemented soon and will be closely monitored, especially on a scientific level. If successful, scaling up the concept within Cameroon and to other interested countries and communities is a viable possibility.

While the project is implemented at the most basic level of a society, a community, it carries all aspects of development cooperation – economic, social and cultural ones. With its high potential for upscaling, our project can promote and mediate social transformation in Africa's rural areas and on a world-wide scale. The concept could create fundamental cornerstones and learnings for the new platform economy in presenting development solution for village or special communities interested.

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