Sub-Saharan Africa • Democratic Republic of Congo

Celtel and Celpay in the Democratic Republic of Congo

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Summary

Celtel International, the African subsidiary of the Kuwait-based mobile telecommunications company MTC, is the leading pan-African mobile communications group, with headquarters in Amsterdam and operations in 15 African countries. Celtel entered the Democratic Republic of Congo (DRC) market in 2000, when the civil war was still raging and faced a market with widespread insecurity, poverty, depleted human capacity, and political and regulatory uncertainty. In addition, there was little to no infrastructure and no existing banking network.

This case looks at how Celtel addressed these special challenges and how the company managed to turn some of them into business opportunities while benefiting the people and the economy of the country. Through its business activities, Celtel has injected cash into rural economies, created hundreds of direct jobs and thousands of indirect jobs, and improved the lot of many urban and rural families, allowing the exchange of information among communities previously isolated by war and the lack of infrastructure.

Celtel has gained over two million customers in DRC, out of a total African client base of 20 million, while contributing to the reunification of the DRC after the ten-year conflict. Celtel also established Celpay (previously part of Celtel and now owned by FirstRand Banking Group) as a mobile banking system to compensate for the lack of a national banking network.

Introduction

In the Democratic Republic of the Congo (DRC), the GDP dropped from US$380 in 1960 to US$224 in 1990 to the current US$120 (in constant dollars). In the year 2000, the economy of DRC was at its lowest, marked by the country’s internal conflict (1997-2003), which hampered investment and trade. The poor state’s absence of infrastructure- particularly roads, electricity and communications- coupled with the size of the country made it difficult to consider developing any state-wide activity. The telecommunications industry in the country was the least developed in the region, with less than 10,000 fixed telephone lines for a country of almost 60 million people.

Challenges and Barriers to Serving the Poor

When mobile telecommunications company Celtel entered the DRC market in 2000, its potential customer base seemed very limited and the ways to reach out to them extremely constrained.
A POTENTIAL CUSTOMER BASE IN A VICIOUS CIRCLE OF INSECURITY, ISOLATION, AND POVERTY

In 2000, the Congolese were caught in the midst of the 1997 to 2003 civil war. Between 1998 and 2004, the war caused an estimated 3.9 million deaths from armed conflict as well as war-related causes such as cholera and hunger. Rape and robbery by the various warring factions made working in the fields dangerous, and armed groups often confiscated harvests. Insecurity also prevented villagers from bringing their produce to markets, because of roadside bandits, the demanding of bribes at check points and the poor state of DRC roads. Insecurity disrupted cultivation cycles and rural communities spiralled into hunger, increased poverty and isolation. Conflict also limited access to healthcare and education, compounding the impact of war on human capital development. The infant mortality rate, for instance, is one of the highest in the world, at 128 per 1,000 people. The Congolese living in cities (33 percent) were less directly exposed to day-to-day insecurity but also suffered from isolation and related pauperization, with cities such as Kindu and Kisangani under siege up until 2002. More than 75 percent of the Congolese population lived with less than one dollar a day. Some regions, such as the Kivu provinces and the district of Ituri, were hit harder than others by the conflict. Even in 2007, the effects of the war are still being felt as an estimated 1,000 people per day continue to perish from war-related diseases, hunger and landmines.

LIMITED WAYS TO REACH OUT

When Celtel entered the market the company faced considerable challenges to reach out to its future customer base. This base was composed of mainly urban elites who could afford handsets and airtime, but also the yet untapped rural communities. The country is the size of Western Europe but with 54.8 million people who have minimal revenues and represent a vast market segment. The main challenges are described below:

An uncertain political and regulatory environment

Up until July 2003, the country was partitioned into four different areas, and the political climate, even in the Western zone and controlled by the Kabila government, was very volatile. This political instability and the lack of laws and regulations, particularly with regard to telecommunications, the financial sector, the corporate and tax laws, the judiciary and the police represented a considerable risk to investors.

1 Roads have not been maintained since the 1960s and are difficult to use in the rainy season. Only 2,800 km of roads in the entire country are surfaced.
2 International Rescue Committee, 2006.
Lack of security and infrastructure
Celtel suffered from the lack of security and road infrastructure needed to deploy its staff, cell phone towers, satellite dishes and generators. Deployment by plane was possible but costly and dependent upon negotiation with various controlling factions. Out of ten provincial capitals, only one was accessible by road, three by river and six only by air.

Poverty and illiteracy
The population is poor, with a GNI per capita of US$210 in 2004. The lowest placed civil servant receives US$21 per month and a teacher receives about US$50, both including transport allowance. Only seven percent of Congolese households have access to electricity and can recharge mobile phone batteries. In most rural areas, users have to travel to the closest village that has a generator. The literacy rate is 68 percent and drops in many isolated rural communities. Also, media penetration is low, with only two television sets and 386 radios per 1,000 people. There were no national media outlets except for the UN-sponsored Radio Okapi, constraining Celtel in reaching out to its customer base using traditional media.

Banking
There was no country-wide banking network, and there was only one branch for every 1.5 million inhabitants and for every 56,000 km²; therefore, many communities had limited access to cash. For Celtel, all funds had to be in cash and transferred by staff from the capital Kinshasa to the provinces and from the provinces (revenues) to Kinshasa. This was particularly problematic given insecurity, lack of infrastructure, and low face value of banknotes with the highest value worth US$1.20.

How Celtel Turned Some of these Challenges Around
Even with the challenges outlined above, the potential for business seemed promising: Africa is the world's fastest-growing cell phone market, and DRC is one of the fastest-growing African markets, after South Africa and Nigeria. Celtel managed to turn many of the challenges it faced into business opportunities thanks to an innovative strategy, strong financial backing from its parent company and previous experience of developing mobile communications operations in African countries (Celtel started operating in Africa in 1995, starting with Uganda and Zambia. From 1999, Celtel extended its activity to Malawi, Republic of Congo, Gabon and Sierra Leone). The way Celtel turned these challenges around is described below.

ADDRESSING THE CHALLENGE OF POLITICAL AND REGULATORY UNCERTAINTY
While the civil war was still raging when Celtel entered the market in 2000, there were at the same time some signs of hope. The Lusaka Accord signed in 1999 with DRC’s neighbours was the first stepping stone on the path to peace. In 2001, Joseph Kabila took power and with strong backing from the international community reached out to the rebel groups. This led to
the Inter-Congolese dialogue in 2002 and a transition government from 2003 to 2006. Celtel correctly identified these growing signs of hope and assessed its risks, knowing that waiting for peace and the return of security and growth would mean having less opportunity to engage in a dialogue with government about the legal and regulatory framework. The situation also required Celtel to enter the market late and have to take market share from competitors already in the market. Celtel engaged in proactive risk management through investing in lobbying and building strong relationships with political and regulatory authorities. In 2003, a new telecommunications law was passed.³ The 2003 law allowed a clearer framework for concessions from the State and exploitation of telecommunications on Congolese territory. At the same time, the Post, Telephones, and Telecommunications Regulatory Agency (ARPTC) was established.

Celtel’s corporate agenda coincided with the Kabila government and then the transition government’s agenda to promote peace, reunification and post-war investment and growth. It also coincided with the donor community’s priorities. Donors were well engaged in DRC’s stabilization, with official development assistance representing 28.6 percent of gross national income in 2004.⁴ This included strong support to improve the business environment and unlock DRC’s extraordinary potential in mining, forestry, hydroelectricity and services such as telecommunications and transport. Celtel’s operations were also very responsive to the post-conflict developments, deploying staff and antennas progressively, as weapons were silenced. The Celtel network, initially limited to the Western Kabila-controlled zone, now covers major centres nationwide (see Figure 1).

Figure 1: Celtel Coverage in DRC (2005)

Legend
- Celtel coverage
- Planned expansion of Celtel coverage
- Main cities
- Waterways

³ The previous law, which didn’t promote competition, led to the fixed operator claiming monopoly rights.
⁴ OECD, World Bank
Addressing the Challenge of Insecurity and Under-Development

Celtel, along with first entrants in the mobile market, Télécel (1985), Oasis (2000), Congo Chine Telecom (2001) and Vodacom (2002), understood that the Congolese would rely on mobile telecommunications precisely to make up for the existing lack of infrastructure, security and social cohesion. A former leader in the sector, Telecel has not adapted to the new competitive environment, while Celtel and Vodacom have used their strong financial backing and their lobbying and marketing know-how to adopt an aggressive three-pronged strategy of lobbying government: deployment of antennae, expansion of coverage (Celtel and Vodacom implicitly share the market by extending their coverage to different parts of the country) and innovative marketing and communications. For example, Celtel, along with Vodacom, has made clever use of the ongoing reconstruction efforts and has provided red and yellow paint (Celtel’s colors) to any vendor of Celtel units. In many villages, the only recently painted walls are Celtel red and yellow, UN blue and Vodacom white, green and blue.

Addressing the Challenge of Division, Isolation and Displacement

Celtel approached the many social challenges of post-war Congo as a core business issue. Celtel recognized the economic importance of mobile communications as a matter of survival and livelihoods for most Congolese, especially the rural poor and those engaged in subsistence agriculture (49 percent of GDP\(^5\)) and informal activities. In a country devastated by war and displacement with a torn social fabric, mobile communications have proven essential to reintegrate communities and reunite families. For example, 377,000 Congolese have taken refuge in neighbouring countries. In the district of Ituri, 600,000 out of five million inhabitants have been displaced. To the extent that they can afford it, displaced people and refugees therefore represent a natural target market for Celtel.

Addressing the Challenge of Affordability

Ninety-eight percent of all airtime units are sold as pre-paid cards. These range from US$3 to $50. Prepaid cards avoid the costs of dealing with debts and bring in an initial positive cash flow. Celtel has also encouraged the use of shared handsets, which is how the majority of handsets are used. Handsets can be shared within a family or managed by “Mamans GSM” (women who rent handsets for the price of airtime plus 100 or 500 Congolese Francs, depending on the region). This offers excellent business for Mamans GSM, providing sometimes over half of the household income and also brings benefits to the entire village through access to communication and information. Development of microcredit in DRC,

notably with the establishment of the first microfinance bank in October 2005, may help develop this business further.

ADDRESSING THE BANK CHALLENGE
Celtel has set up a subsidiary, Celpay (now owned by South Africa based FirstRand Banking Group), to develop and pilot a system to wire funds across DRC using encrypted SMS technology. Launched in 2004, Celpay is the only phone banking operator in DRC. Celpay managed 20,000 accounts in 2006. Individuals and companies can manage their bank account by mobile phone and/or the internet. By sending an encrypted SMS, the user can transfer funds from his or her personal bank account to other bank accounts (to relatives or employees, for example). It is most widely used to pay staff scattered across the DRC to pay for gas throughout the country, bills, and to transfer airtime communication units. This system addresses Celtel’s problem of bringing the pockets of cash generated by sales of communication airtime back to Kinshasa. It also helps address, in part, the problem of cash circulation in the country, making use of pockets of stagnating cash in some places (for instance, in gas stations, prepaid card vendors and beer distributors, and by bringing fresh cash into venues). The two activities of mobile banking and phone banking are inter-operable; they allow economies of scale, and the mobile communications client base offers a platform to develop the mobile banking client base. The prudential issues involved in mobile banking operations (e-money, cash payments) and associated fiduciary risks are managed by Celpay, and functional issues are managed by Celtel. Celpay has partnered with companies and government agencies during deployment across the country since 2004. For example, the government launched a program in 2003 to demobilize and reintegrate 150,000 former combatants into the communities of their choosing throughout DRC’s 25 provinces. In the absence of a banking network, it has chosen Celpay to pay each combatant US$25 each month over the period that the government supports their reintegration.

ADDRESSING THE CHALLENGE OF MARKETING
While a mobile phone is a symbol of status everywhere, it is even more so in Congo. Due to the cultural significance of the spoken word and the fact that losses of revenue and status have affected individual identities, Celtel has recognized the social importance of mobile communications and has invested heavily in marketing. For example, its advertising campaigns emphasize re-connecting people previously separated, believing in oneself and building a new tomorrow—all themes that resonate in a post-conflict country. Overall, Celtel has demonstrated their willingness and ability to reach the poorest, with deployment in eleven provinces, and quality of service that takes into account social challenges such as illiteracy.
ADDRESSING THE CHALLENGE OF ILLITERACY
Celtel began by offering a limited, simple, trusted and convenient range of products: prepaid cards with only five face values and one price for all calls whether or not they were to other Celtel numbers or whether they were within DRC or abroad. Over time, Celtel offered a more sophisticated range of prices and options (e.g. for peak- or off-peak hours, standard or family rates, prepaid or electronic refill using Celpay, etc.) Also, customer care centres are being deployed throughout the country to help clients better use their mobile phones and use them more often. Thirteen customer care centres have been created since early 2006. The mobile banking system is user-friendly, because it relies on encrypted SMS technology. SMS is widely used thanks to the low cost compared to calls (5 cents per SMS vs. about 28 cents per minute for calls). There is anecdotal evidence that the introduction of some mobile phones in remote villages has helped literacy.

ADDRESSING THE CHALLENGE OF CAPACITY
Confronted by the lack of capacity in the sector of mobile telecommunications and related corporate activities, Celtel invested in training programs targeting dynamic youth and more experienced managers, using knowledge and experience-sharing from its staff at headquarters and in other African countries. This choice proved to be fruitful in terms of capacity development, as Celtel became an important source of employment in DRC and is renowned for its efficient management.

Benefits for the Poor and Celtel’s Bottom Line
Celtel’s activities are profitable and offer immediate benefits to the poor.

THE BOTTOM LINE
Celtel’s risk-taking has led to the development of a successful business model: Celtel has gained more than two million customers in DRC’s 25 provinces. Celtel earns more per customer in the Congo than it does in more developed markets, in part because of the low penetration of landlines (10,000 for a population of 54.8 million in 2002) and mobile phones (10,000 users) when Celtel entered the market. DRC is now sub-Saharan Africa’s fourth largest market and is forecast to continue to grow rapidly, with over nine million new mobile phone customers projected in the next five years (see Figure 2). Celtel is well placed to capture market share in this rapidly growing market.

Figure 2: The Mobile Phone Industry in DRC

<table>
<thead>
<tr>
<th>Year</th>
<th>Event</th>
</tr>
</thead>
<tbody>
<tr>
<td>1985</td>
<td>First mobile phones</td>
</tr>
<tr>
<td>2000</td>
<td>10,000 customers; First GSM network in DRC</td>
</tr>
<tr>
<td>2003</td>
<td>1 million customers</td>
</tr>
<tr>
<td>2005</td>
<td>3 million customers – 4 networks – penetration rate 5%</td>
</tr>
<tr>
<td>2010</td>
<td>10 million customers – 6/7 networks – penetration rate 15% (expected)</td>
</tr>
</tbody>
</table>

BENEFITS FOR THE POOR
Peace has yielded benefits for the poor, and mobile communications have acted as a multiplier of these “peace dividends.” Communications in a country of such deadlocked provinces as in DRC directly impacts development, boosting growth and empowering the poor. Benefits for the poor are described in further detail below:

Investment and growth
To date, Celtel has invested over US$300 million in DRC, equivalent to 15 percent of the US$1.83 billion that the World Bank has invested in DRC over 2001 to 2005 in the form of loans and subsidies. This is an important investment that stimulates growth and employment. According to a study conducted in several African countries, an increase of ten mobile phones per 100 people boosts GDP growth by 0.6 percent, and one can project a higher multiplier effect for the Congolese economy, which up until 2001 had 14 years of negative growth.

Cash injections
Celtel has injected cash in rural economies with a high, virtuous multiplier effect on the local economy (local investment and buying of goods and services). Cash transfers and the circulation of information have also contributed to ironing out some of the high price differentials that existed between western and eastern DRC, but also from village to village within one territory because of poor roads, transportation and communication.

Livelihoods
Celtel has allowed previously isolated communities to exchange information and conduct business; farmers and small-scale entrepreneurs can reduce the cost of travel, get information about the price of goods to sell and to buy, as well as on security and road conditions. Job seekers can seek information on training and on opportunities in both the formal and informal sector.

Social capital
Celtel helps restore the social fabric, torn by a decade of war, including relationships of solidarity within the extended family and the clan. Increased communications also helps build trust and information-sharing.

Jobs and training
Celtel has created thousands of jobs, trained local technicians and a sales force throughout the country, building a pool of professionals with international standards (through the Celtel Academy in Kinshasa and Technical Center in Kananga). Besides its Celtel boutiques in major cities, thousands of distributors buy prepaid and SIM cards in bulk from Celtel and resell to vendors. Therefore, users can either buy directly from distributors in main cities or from single retailers.

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Celtel has also created jobs through small phone-renting businesses and second-hand mobile phone retail shops. Jobs created in cities tend to benefit the more educated, richer population, but street vendors and vendors in rural areas usually cater to poorer clients. There are many cases of former street children and child soldiers who have turned to selling prepaid cards for a living. For example, a Kinshasa-based entrepreneur has recruited former street children and bought specially designed red and yellow overalls for his vendors, with different pockets for different types of cards and they are easy to spot on the streets.

**Access to health and education**

Families can get information on how to access basic health and education services and can call a doctor when someone can’t be transported to a clinic.

**Impact on gender**

Mobile communications have also helped women improve their access to production factors such as capital, work and education, which is typically lower than men’s access to the same. Women, young and old, can start a mobile Celtel kiosk with US$200 and earn their living. There are cases of women ex-combatants or “bush wives” of former combatants who are rebuilding their lives in this way. In a case near Kisangani, illiterate women who can’t write their last name have boosted their business by arranging that their customers call them on their cell phones whenever they want to buy fresh fish or “pundu” (cassava leaves). Mobile phones are widely used by the businesswomen known as “Mama Benz,” who conduct business with suppliers abroad and gain autonomy from their husbands.

**Impact on youth**

Mobile communications also help youth start small, informal businesses, particularly in trade, including across borders, with neighbouring Rwanda and Uganda (in dried goods for example) and also with Dubai, Shanghai and Jakarta (in businesses such as textiles and equipment).
Access to cash

Mobile communications play a big role in remittances from exiled Congolese to their relatives in DRC. In addition, Celpay’s mobile banking system makes up for the lack of a national banking network. In particular, the lack of financial services for the poor can help minimize opportunities for criminal activity, allow for a greater geographic reach of the financial system under GSM covered zones and increase liquidity and time-value of un-captured cash. Mobile banking is also a convenient cash-flow management solution for retailers throughout the country.

Opportunities for Growth & Scaling Up

There is room for continued convergence between business interests and benefits for the Congolese poor. Celtel’s business model has been successful and is bound to continue to generate profits if peace holds and the economy continues to pick up, as it often does post-conflict. GDP growth reached 6.8 percent in 2004, with a projection of seven percent in both 2006 and 2007. Real GDP per capita has grown more than ten-fold since 2000, and private consumption has grown as well.

Sector-specific data analyses are also encouraging. Transport and communications, which represents 3.9 percent of GDP, are the fastest-growing sectors in the Congolese service sector. Mobile communications is essential to informal trading, which comprises nearly 90 percent of the Congolese economy. Celtel benefits from being one of the first entrants, and the market is still young, with extremely low mobile (eight percent) and fixed-line telephone penetration, even by African standards. Celtel will have to manage its advantage in a market that remains challenging, especially with fierce competition, given the presence of five other mobile phone providers and particularly the activity of Vodacom, which shares most of the market with Celtel. At the same time, the market is full of opportunities, benefiting from post-war stabilization and growth, as well as increasing purchasing power. Mobile penetration in DRC is forecast to reach 15 percent by the end of 2010.

Celtel has the capacity to respond to new opportunities and scale-up operations. Coverage went from one city to the eleven provinces of Congo in only five years. Celtel’s activities are scalable within DRC, with benefits in terms of economies of scale (lobbying for a sound regulatory framework, call centres, marketing, etc.) and learning (negotiations over regulations and for antenna deployment). Celtel also continues to innovate to remain the leader in DRC: Recently, after recognizing the importance of cross-border ties with neighbouring countries (trade, investment, migrations), Celtel introduced a flat pan-regional call rate in 2006 and abolished roaming costs for all Celtel customers travelling between

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8 World Bank.
10 OECD, 2006.
11 MTC Results release May 2007.
DRC, Republic of Congo, Gabon, Kenya, Tanzania and Uganda in 2007. Also, Celtel has developed its services for corporate accounts. As more and more investment is flowing in, companies that had stopped operations have resumed business, and revenues in some sectors have started to soar (mining, construction and electricity, trade, transport and communications for example).

DRC is also viewed by Celtel as a pilot for other “challenging” countries and markets, particularly Sudan, where Celtel’s parent company bought mobile operator Mobitel in February 2006 and where Celtel can apply lessons learned in making profits while bringing benefits to the poor.

The experience of Celtel in the DRC is an example of how a war-torn context can be overcome and its pitfalls turned into business opportunities and how mobile communications can bring immediate benefits for the poor.
References


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**Interviews**


