1.5. Key Finding 2: Third Parties Will Implement Complex Community Power Applications

Mobile Operators Have Already Adopted an Outsourced/Managed Services Business Model

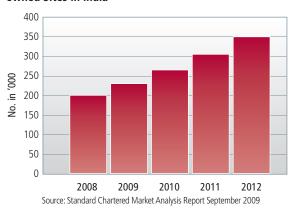
Increased market competition in high growth markets such as India has put tremendous pressure on the operating margins of mobile operators, which is driving increased popularity of the outsourced/managed services business model.

Operators already outsource several of their critical but non-core functions – from call centres to network infrastructure, which enable them to reduce their operating costs. This is especially attractive in emerging markets where ARPUs are typically very low. For example, India's largest mobile operator, in terms of subscribers, Bharti Airtel⁵, has successfully adopted the managed services model which allows it to focus on enhancing customer experience and product innovation¹⁰.



The best illustration of this model is the telecom tower infrastructure industry in India, whose structure has undergone a significant change in the last two years due to the arrival of tower companies who now own more than 80% of the country's telecom towers¹¹. Tower companies build and lease telecom towers for operators to setup their base stations. The growth in the Indian telecom tower industry is illustrated in Figure 10.

Figure 10: Growth Projections of Tower Companyowned Sites in India



- According to a report¹², there are an estimated 240,000 towers in India today, and this number is expected to grow to more than 350,000 by 2012
- These sites are designed to be shared and hence have less excess power
- Similar high growth markets such as Nigeria and Indonesia are quickly adopting this model.

The evolution of managed services/outsourcing model is described in Figure 11:

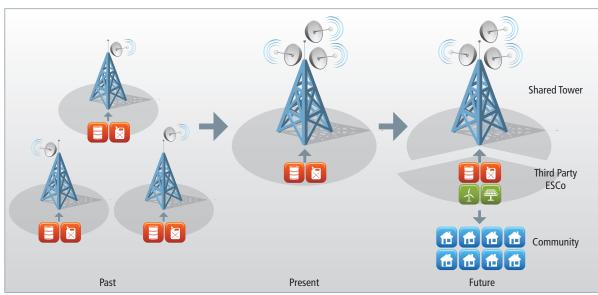


Figure 11: Evolution of Telecoms Infrastructure Business Models

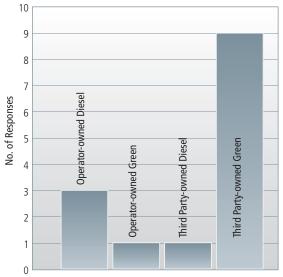
Thus, most mobile operators and tower companies do not see a risk in outsourcing their power requirements to managed services or third party ESCos.

Operators Favour The Third Party Community Power Scenario

Mobile operators and tower companies have strong interest in the scenario whereby third party-owned green power plants provide power to local communities and telecom towers. However, these third parties need to provide very high quality service with minimum outages since operators/tower companies have very high service level requirements.

GSMA research on the preferred scenario for Community Power implementation has found that, several operators and tower companies are willing to pilot this scenario. Figure 12 summarises this research.

Figure 12: Preferred Community Power Scenario



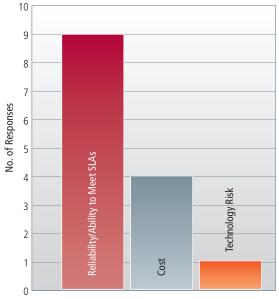
Source: GSMA Interviews - Operator/Tower/Managed Service Companies

As described by a leading Indian tower company, "The energy supply company must provide 24/7 energy supply. They can't run for a year or two and then stop. We need a long term contract with them. However, NGOs in India are very efficient in providing such energy supply. We are already working with a Community Power plant on this model".

A global mobile operator said, "We would welcome more Community Power companies. But we would need them to be professional companies. Our expectations are high. These companies have to compete with diesel generators which provide the lowest-risk option". Figure 13 summarises this research.



Figure 13: Concerns for Outsourcing Power to a Third Party ESCo



Source: GSMA Interviews - Operator/Tower/Managed Service Companies

Conclusion

- An opportunity exists to create a new business model for off-grid energy access by combining power demand from mobile base stations and communities, thus creating strong business and social value
- Operator-owned sites will implement simple Community Power applications such as handset charging and large household (12V) battery charging
- Mobile operators and tower companies already outsource several of their core functions and are willing to adopt the third party green power scenario, if their high service level requirements can be met.