

Communication preparedness for planned/emergency load shedding

1. Background

Eskom generates approximately 95% of the electricity used in South Africa and approximately 45% of the electricity used in Africa. We have more than four million customers, across Southern Africa connected by 390 000km of power lines to more than 41GWs of installed generation capacity.

An electrical system collapse in South Africa, colloquially known as a blackout, would qualify as a major disaster since the estimated time to return the electrical system to a generally healthy state would be at least 7 days for the major metropolitan centres, and longer for the rest of system. Electricity supports communications, water supply, refuse removal and fuel refining and pumping, to name but a few essential services. Most of these cannot maintain their function for more than a day without electricity- a week would exhaust all emergency measures.

Load shedding is the last resort of any electrical utility before system collapse. Load shedding restores the balance of supply and demand by actively forcing the demand down to meet the available supply. While effective, it comes at a large cost to the utility's customers. In the case of Eskom the customer base is effectively the whole of South Africa. Load shedding will be used if necessary to avoid the much larger impact of a blackout, but it has substantial social, economic and even political costs which cannot be ignored.

2. Communication activities to mitigate load shedding

The only real way to mitigate the impact to customers being shed is to inform them as early and accurately as possible. During the load shedding experience of 2008 the following effects were found:

- The contact centres were overwhelmed with calls.
- The Eskom website initially crashed due to the burden of people searching for schedules and explanations
- Eskom's customer base is so varied that no single communication channel could be relied on to get to any sizeable portion of it.
- Using load shedding was devastating to Eskom's reputation, but this was further compounded where the information was lacking, or the schedules seemed either inaccurate or unfair.

This paper will describe the various measures and channels being developed to cover the disparate customer base, meet the various customer needs, and ensure the fair application of load shedding in the least damaging way possible.