

IST Operational Datacentre

Project Background



During the IT migration to a new datacentre the client decided to upgrade the site capacity by 50%, making available a further 750m² of raised floor space. A project was managed by Mafi Mushkila to implement the additional generator, chiller and UPS capacity to service the additional space. As the building was already hosting live IT services it was not possible to complete the full Integrated Systems Test (IST); tests were identified that required a full power down of the datacentre.

The client's IT systems were split between two active / passive datacentres with shared storage mirrored between datacentres.

Mafi Mushkila developed a project to facilitate the powering down of the datacentre. To enable the outage, resilient systems would be failed over to the other datacentre and those systems that did not have resilience, outages were negotiated. It was not possible to fully failover the shared storage, as re-mirroring the data could not be achieved within the service outage window. A solution was developed to maintain power to the storage arrays and the SAN fabric.

The solution required the installation of a temporary generator, UPS, resilient chillers, chilled water mains and room air condition units (RACU) that could operate in isolation from the datacentre's services. Agreement was gained from the storage and SAN fabric vendors to disconnect the 'B' power feeds from the building service and re-connect to the temporary service.

From inception to execution the project was achieved in 6-weeks. During the IST power and cooling were maintained to the storage infrastructure for 56-hours with no data loss or interruption to operational IT services.

