



El Paso Corporation

CASE STUDY

GOALS:

- ✓ • Reduce Energy
- ✓ • Reduce space utilization
- ✓ • Improve reliability
- ✓ • Improve future expansion capacity
- ✓ • Simplify

SITUATION

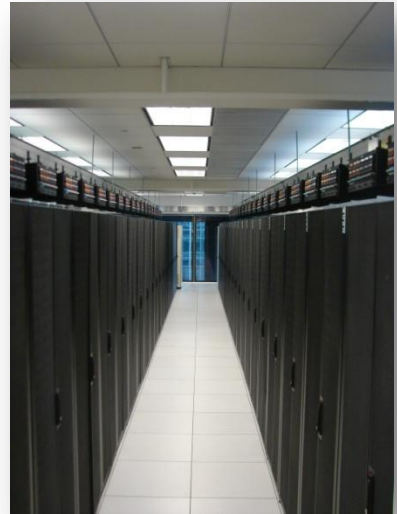
The 17 ksf Data Center at the El Paso corporate headquarters building in downtown Houston was originally designed for a mainframe. As server technology was deployed, electrical power and communications wiring was routed within the raised floor. Consequently, airflow was restricted and additional constant volume CRAC units were installed to help keep the Data Center cool.

LIFE CYCLE STUDY

A Data Center Team was formed to determine whether El Paso should Build, Collocate or Renovate within the existing building. Renovation was the most economical choice considering the recent investment in the generator and UPS infrastructure. Contrary to a previous study recommending 25 ksf, the Team recommended reducing the space to 10 ksf, utilize virtual servers, and utilize variable speed CRAC units.

RESULTS

The 9.9 ksf Tier III Data Center was commissioned in May of 2008. Electric loads were reduced by 300 kw with approximately 2,500,000 kwh in energy savings. Virtual servers were such a success nearly half of the racks are available for expansion. The fully redundant MEP systems have simplified operations and maintenance. The City of Houston granted El Paso an exemption to the requirement of an EPO system reducing the potential for human error.



“Project success is accomplished with excellent planning and assembling the right Team...”

Greg Schindler, PE, CFM

PROJECT TEAM

DEVELOPER
Hines

MEP ENGINEERS
I.A. Naman + Associates, Inc.

GENERAL CONTRACTOR
Gilbane

ELECTRICAL
Britain Electric, Co.

MECHANICAL
MLN Company

