

# Executive Summary

## **Analysis 1:** It's Never Too Late to Go Green

700 6<sup>th</sup> Street started construction May 2007 and substantial completion was achieved in April 2009. In fall of 2008, only months prior to substantial completion and LEED Silver certification a new goal was announced. The new goal would be to achieve LEED Platinum. This plan was cost effective and did not have schedule impacts. The first thing the team looked at was optimizing energy performance by upgrading core lighting, reducing garage lighting power density, adding garage lighting occupancy sensors and adding tenant day lighting controls. This was followed by increased requirements for, and verification of, construction waste management, recycled content, low emitting materials, reduction in water use and tenant sub-metering.

## **Analysis 2:** Alternative Stone for Lobby

The stone used in the Lobby was very expensive and came from Italy. There is a lot of money tied up in this lobby. I changed the floor to granite which is a more durable material. This change saved money and did not change the look of the lobby.

## **Analysis 3:** Glass Bridge Improvements (Structural Breadth)

In the main lobby there is a glass bridge and glass floors. The problem with having a glass floor is it is very delicate. A week after the glass floor was installed a screw driver was dropped on the glass causing it to spider crack all the way through the glass. At the moment a total of 5 panels have been broke and replaced. Each glass panel is approximately 8 feet x 4 feet. These panels are approximately \$10,000 each to replace and install and are only produced by 2 manufacturers. The lead time for these panels is months and is not easy to replace. From my research I found that increasing the thickness of the glass will prevent the glass from breaking and also does not affect the structural system.

## **Analysis 4:** Precast vs. Handset Stone (Architectural Breadth)

Handset stone is very expensive and time consuming. The first 4 floors of 700 6<sup>th</sup> street use handset stone, the rest of the building uses precast with limestone casted into place. Handset stone is much slower and more expensive than precast. After the analysis precast was found to be more cost effective.