

# Does Green Still Pay Off?

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In one of the earlier office property studies authored with Andy Florance and Jay Spivey entitled "Does Green Pay Off?" comparing green buildings, defined as either Energy Star labeled or LEED certified at any level, published in the *Journal of Real Estate Portfolio Management*, Vol.14, No.4, Oct-Dec. 2008 we found strong evidence of both significant rental premiums but also faster absorption and lower cap rates/higher prices per square foot. Since that date we have noted a flurry of buildings planned in the 2004 to 2006 period but delivered since late 2007 which have become LEED certified.<sup>1</sup> Much of the Class A construction for new office buildings has been aimed at becoming LEED certified and in some markets, like San Francisco, it is a requirement. The timing could not have been worse for those coming on line in 2008 and 2009 and we have seen this have an impact on the latest statistics making apples to apples comparisons more challenging. Our findings and those of several academic studies suggested significant rental premiums and significant sales prices premiums.

Costs which run nothing extra for an experienced team of designers and contractors to hit silver or better were easily surpassed by the value impact. Investors and developers knew this to be true, even if appraisers lacking sufficient local comps would not verify the value premiums. In some cases and some local markets rents were not always higher as tenants were unwilling to pay more for a more efficient building and this resulted in an increasing proportion of full service or gross leased buildings so that landlords could reap the benefits of energy or water saving investments. In other cases tenants were required to lease in the equivalent of a LEED certified building (i.e. Federal agencies or California State government offices) or wished to lease green buildings as part of their CSR (Corporate Social Responsibility) policies and we observed significant rental premiums. Since then we have observed a growing interest in green leases and provisions by which energy savings benefit both the landlord and the tenant, but cynics remain and beyond the savings in energy or other resources, the ultimate market tests will be borne out through the impact on tenants via less sick time or higher productivity and retention of employees. For we now understand that the human costs are much greater than the operating costs and any significant impact on tenant productivity swamps energy or water savings. In this regard a few studies have started to shed some light on the probability of greater productivity. In "Green Buildings and Productivity" by Dave Pogue and myself published in the *Journal of Sustainable Real Estate*, 2009, see [www.JOSRE.org](http://www.JOSRE.org) we found that many tenants experienced less sick time and greater productivity. At the same time it is clearly possible to well manage a non-green building or miss manage a green building and more study remains before green features than pay off become mainstream.

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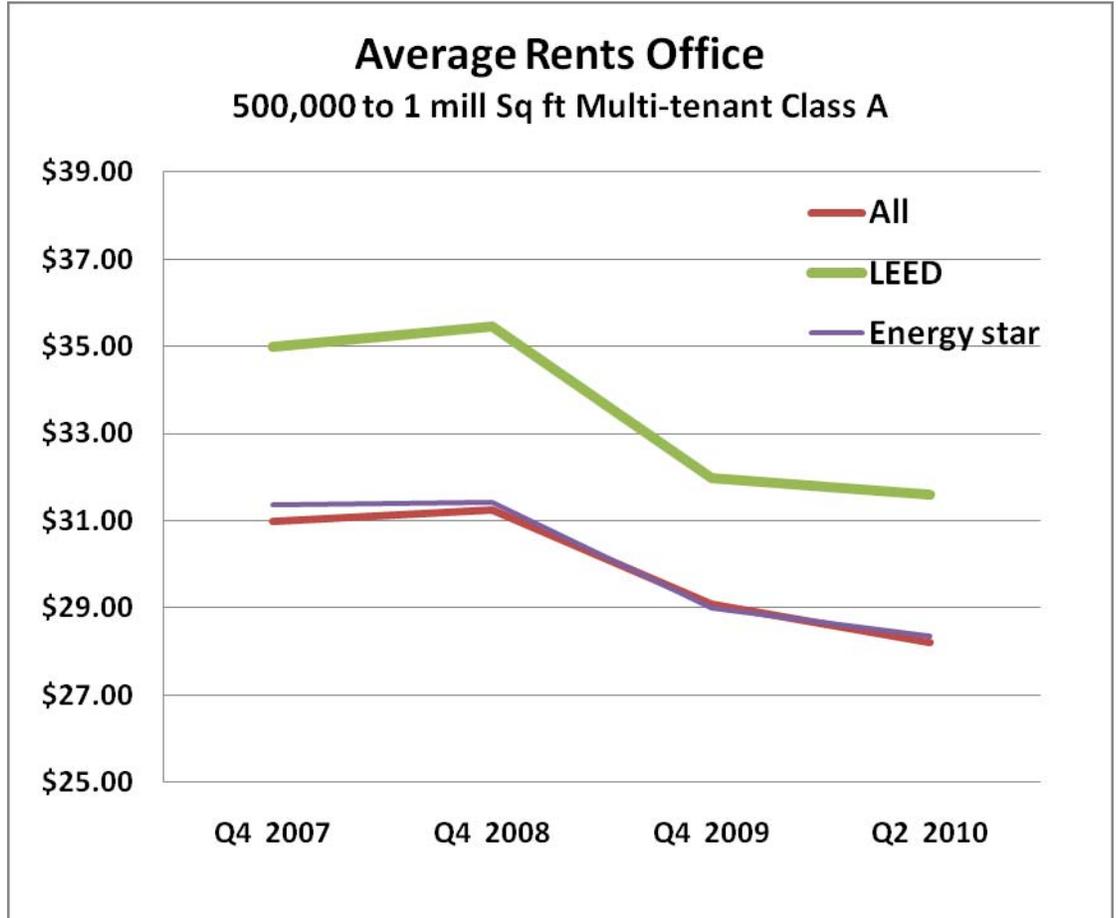
<sup>1</sup> LEED stands for Leadership in Energy and Environmental Design and is awarded by the USGBC at the certified, silver, gold, and platinum levels.

One constraint on the greening of existing buildings or investment in better quality buildings are the lack of understanding by most appraisers who have suddenly become conservative in their valuation practices and lack the training to understand how to value green features such as more efficient cooling systems and better air flow and gray water recapture systems. Someday this will change, but until then we hope that CoStar data, already used in a number of academic studies can be mined to understand the realities of the market.

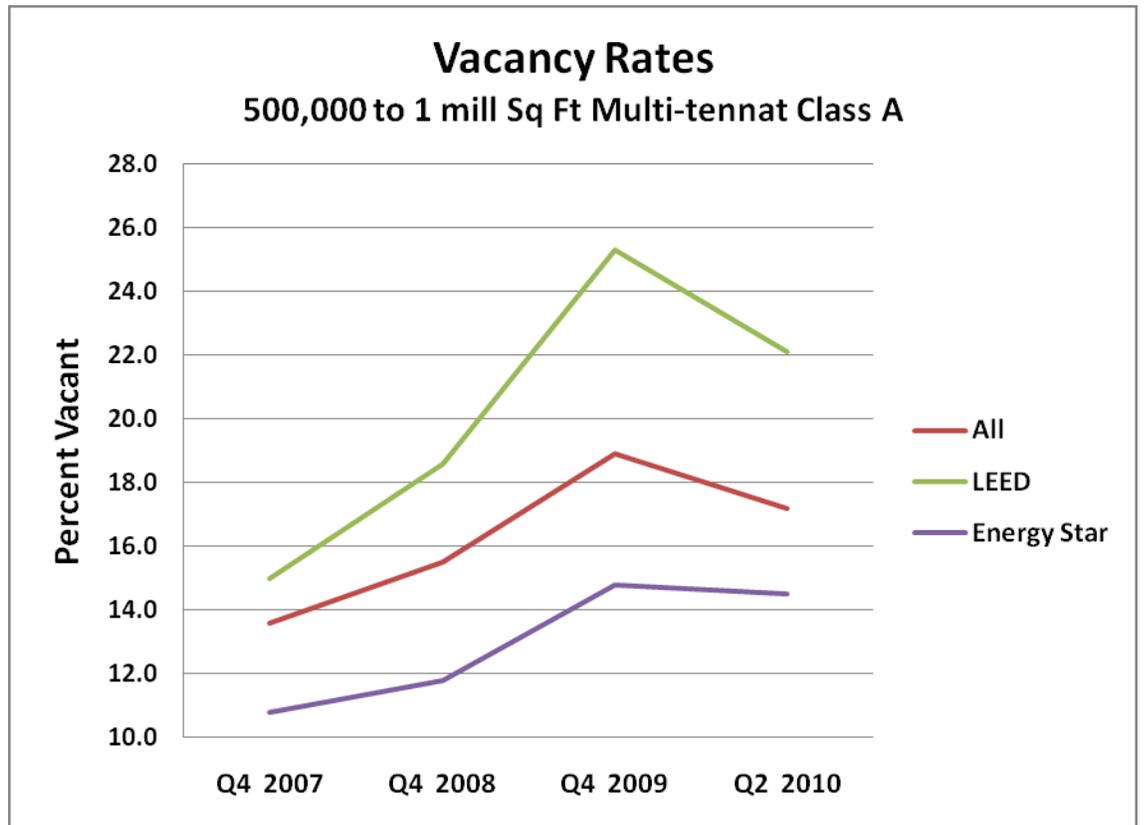
We provide an update here on rents in Exhibit 1, vacancy rates in Exhibit 2, Cap Rates in Exhibit 3 and Sales Prices Per Square Foot in Exhibit 4 below. Of these the rent figures and vacancy rates are valid graphs for general comparison but the cap rates and sales prices are provided with strong caveats that there is very little data behind these numbers. In total only 378 Class A commercial office properties have sold in 2010, as of the time of this writing, and of these only 5 were LEED certified and only a dozen were Energy Star labeled. We note the following results. Rents continue to show premiums for LEED properties of several percent over non-green counterparts even though any of these came on line during soft markets. Energy Star labeled property rents appear more in line with the overall market. The delivery timing of many LEED buildings has resulted in higher than average vacancy rates by about 4% to 5 % on average but we note that the rental premium makes up for this differential in most markets. A vacant building searching for tenants is less likely to be focused on selling green features and simply trying to find tenants and make a deal. In Exhibits 5 and 6 we provide a list of the greenest and brownest regions or states in the US.

In the long run these greener buildings are likely to retain more value as the bar is raised and tenant expectations change. Many of the green building owners plan on keeping their properties. They know that in the long run this modest effort pays off very well indeed. Those who have ignored many of the simple actions necessary to improve existing buildings when undergoing a retrofit, and this includes distressed property, or to design buildings for greater occupant comfort and operating efficiency will find not a premium for green but a discount for brown.

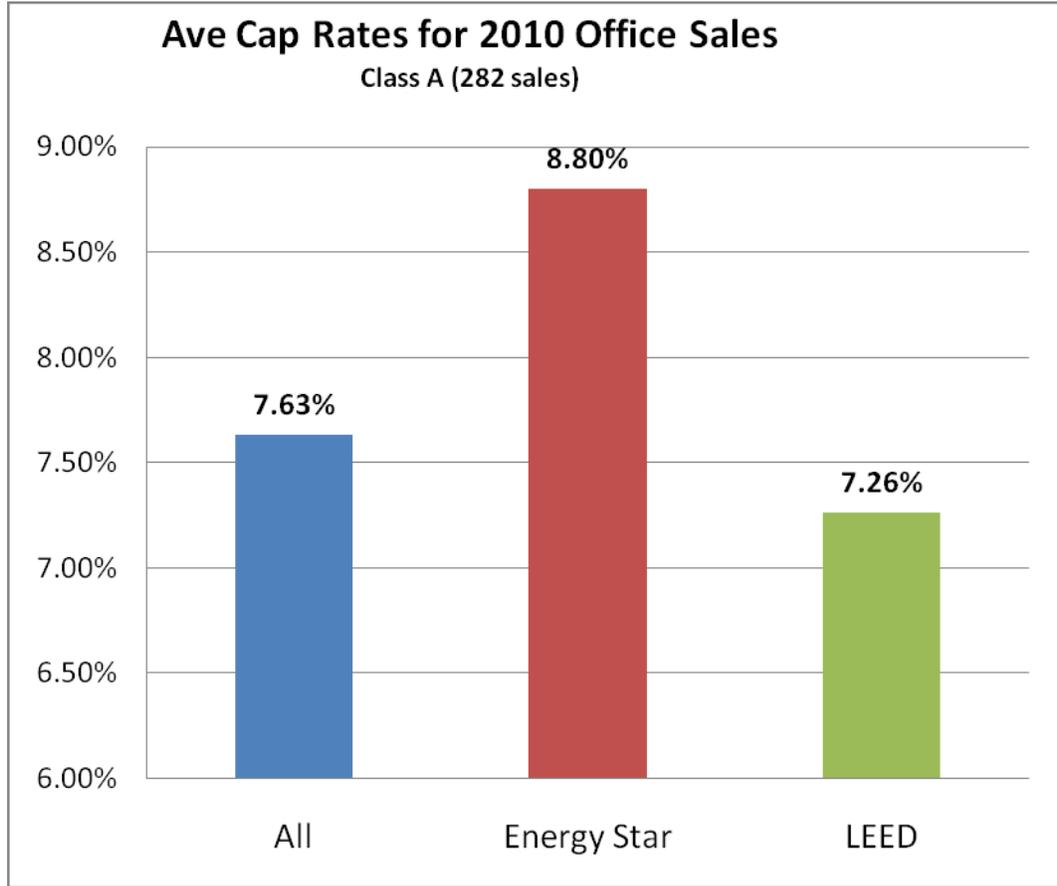
# Exhibit 1



## Exhibit 2



### Exhibit 3



## Exhibit 4

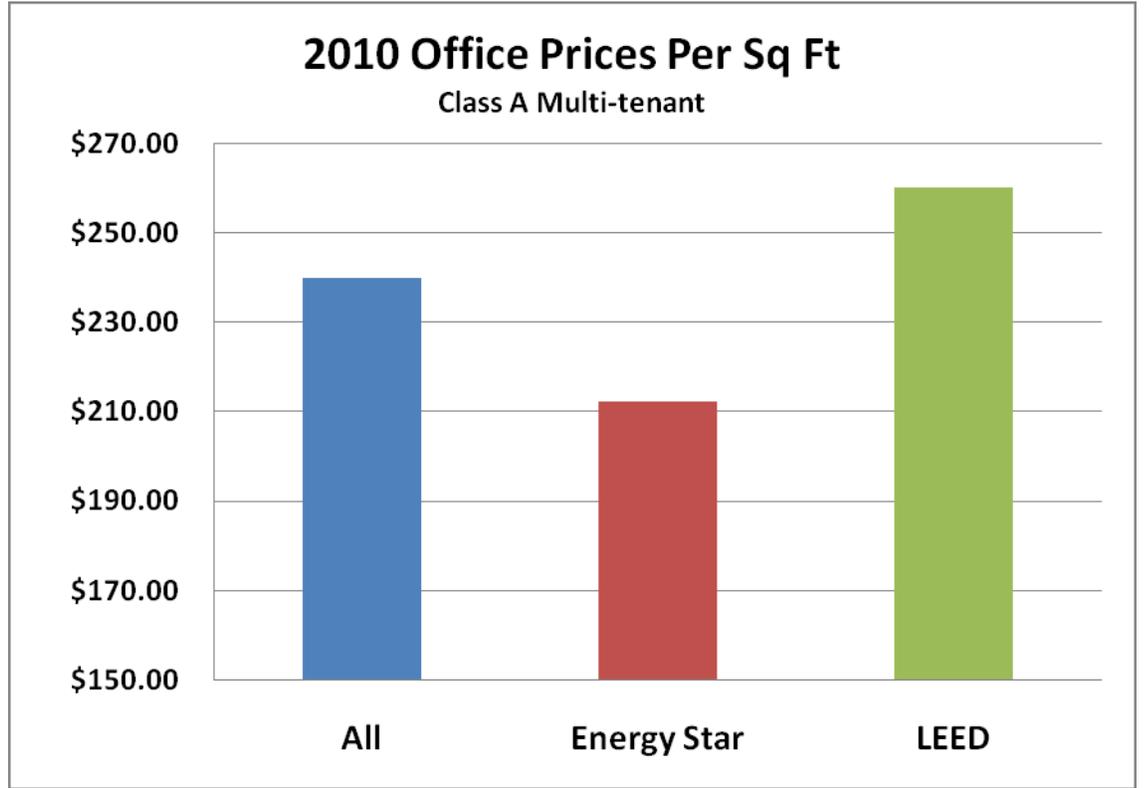


Exhibit 5: Top 10 Greenest States/Region based on the proportion of green office buildings relative to the total stock of buildings in the market.

	Greenest State
1	DC
2	OR
3	VT
4	WA
5	CO
6	MA
7	ME
8	NH
9	IL
10	CA

Exhibit 6: Top 10 Brownest States/Region based on the proportion of green office buildings relative to the total stock of buildings in the market.

1	OK
2	LA
3	WV
4	SD
5	MS
6	ND
7	AL
8	KY
9	IN
10	NE