

# Energy Savings vs. Energy Waste: Which One Motivates You?

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By Eric Woodroof

Do you know that people are more motivated to avoid pain than to achieve a reward?

For example, if I told you that you will receive \$1,000 if you read all of my articles, only a few of you would jump at the chance. But if I told you that you must pay me \$1,000 if you do *not* read all of my articles, most of you would take action and be sure to avoid such a penalty. Note that the penalty is the same as the reward, but psychologically, most people will do more to avoid a penalty than to earn a reward. Perhaps this behavior originates in our childhood? (Don't worry – I'm not going to go "Freud" on you with this article.) In any case, this aspect of human behavior can be effective in presenting the business case for energy management projects, which represent the opportunity to earn a reward *and* to avoid a penalty.

Energy management projects typically involve upgrades to lighting systems, HVAC, controls, or other systems in order to reduce the amount of energy consumed. Often these projects have a very good return on investment and good payback.

But during the past 30 years, these projects have often been described as "discretionary," meaning that a company can continue to operate "business as usual" without implementing them. Thus, despite their financial merits, energy management projects often receive a low priority and are put on the back burner by a company's management team. Whether due to the economy, production issues or other "critical needs," energy management or savings projects are perceived as being "less valuable" than other projects having equal savings or profit benefits.

This is an illusion.

The illusion is reinforced by the way that many energy managers present projects that save money. Energy managers often say, "if we implement this project, we will save x dollars per year." This way of stating the benefits may capture the enthusiasm of a few people. However, an alternative message is "if we don't do this project, we will continue to waste x dollars per year." The alternative format is not only accurate, but also creates a sense of urgency as the audience realizes that it is wasting the money RIGHT NOW while weighing a decision.

The alternative format can be enhanced by using additional fear-based, yet completely valid, motivators. For example, the alternative method could become, "if we don't do this project, we'll continue to waste x dollars per year and lose a competitive advantage." By introducing another idea – competitors – management is motivated to avoid being "left behind."

When projects require some sort of investment upfront, the alternative approach can be used for net present value (NPV) statements, which are a more complete evaluation of a project. In this case, the energy manager can say, "The NPV of this project also represents the NPV of the wasted dollars associated with doing nothing, or continuing to do business the way we are doing it now."

The fact that most people would rather avoid paying penalties than reap rewards can also become a factor when dealing with financing costs for a project. In this case, this financing cost can work against the project, at least initially. For example, assume you work for a company that has no capital budget to implement an energy management project and you have to borrow money from a bank to get a project started. To finance a \$1 million project, you may have to pay the bank 10 percent, which (in simple terms) would be \$100,000. Many folks in top management will have a natural tendency to avoid financing costs and in essence, avoid this "penalty" by not doing the financing (and therefore

not doing the project). Unfortunately for this logic, many energy projects can save 15 to 25 percent, which means that even after accounting for finance expenses, the project still generates savings, i.e. "the finance cost is the lesser of two evils." Personally, I like saying, "the cost of delay is greater than the cost of financing."

In addition to capturing the energy savings (or current wasted dollars), there are often other benefits associated with energy management. For example, by saving energy, you also reduce your carbon footprint and your company appears more "green." Being more "green" could help you in many ways, like attracting better employees, improving community morale, improving sales versus your competitors, or reducing risks of future energy price spikes. There are many benefits from energy conservation, and these are real dollars that are equally relevant to any other profit centers in an organization.

Putting this all together might create a value proposition that sounds like this: "if we don't do this project, we'll continue to waste x dollars each year, lose a competitive advantage, and miss out on some green marketing opportunities to capture additional market share."

Of course, the message that energy managers use depends on the audience and what is most important to that audience. For upper-level management, the message should revolve around money and gaining a strategic advantage over competition. For lower-level managers/staff, the message might involve reducing hassle, making life easier, etc.

There are many valid ways to communicate a project's value, but some are more persuasive than others. Identify the approach that works best for your project and audience.

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