Energizing Workplace Wellness Programs: The Role of Incentives, Rewards & Recognition

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About this Research

This paper is based on a review of hundreds of research papers, book excerpts, essays, articles and case studies on workplace wellness, population health management, and preventative medicine from approximately 1985 to the present day. The material has been synthesized to present the most relevant material and findings on workplace wellness programs —including the use of incentives and rewards and government initiatives and legislation aimed at workplace and general wellness— in as succinct and logical manner as possible.

This paper is intended mainly to serve as a synthesis of the current state of workplace wellness programs, and specifically, the use of incentives and rewards therein. This is not original research. Where recommendations and conclusions are offered, they are the opinion of the author and do not necessarily represent the views or opinions of the Incentive Research Foundation or its members.

The main objective of this paper is to present in one place the emerging landscape from which the reader may appreciate the complexity of the topic, the richness of positions and practices in place, and the variety of issues involved, all of which make workplace wellness a fascinating arena with real potential to create a better future for Americans and the nation.

> *Starbuck's chairman recently noted that his company spends $200 million per year on insurance for its employees—more than the company spends on coffee.*
>
> **(WELCOA, 2009)**

EXECUTIVE SUMMARY

Healthcare costs are escalating rapidly and globally, accounting for greater shares of the GDP of developed world nations—their threat to national economies exceeds any other single cost item. It is no wonder that individuals, families, employers, communities and governments are urgently seeking solutions. Most agree that the greatest potential lies in reducing the largely preventable conditions and diseases brought on by poor individual health choices. Between 70% and 75% of the $2.5 trillion spent annually in the U.S. on healthcare is invested in the treatment of preventable conditions, but less than 5 percent goes toward chronic disease prevention (Department of Health and Human Services, 2010).

The question is how to drive healthier communities and organizations. How can employers and governments help individuals change their behaviors to stop smoking, stop overeating, exercise more, wear seatbelts, consume less alcohol, get regular health checkups, take their medications and change their diets?

Among the most promising approaches is the use of incentives, rewards and recognition in the encouragement of healthy lifestyles and choices. A growing and compelling set of evidence exists which correlates well-designed wellness programs—which almost invariably include incentives and rewards—with better health and wellness outcomes.

A growing community of practitioners, experts and policy-makers favor the use of incentives to encourage not only participation in wellness programs but outcomes. "Attainment" incentives (rewards based on achieving wellness objectives) operate similarly to auto insurance policies. If I am a reckless driver, if I drink and drive, if I disobey speed limits, etc. (and if I get caught) I expect to pay higher premiums and probably will. Likewise, if I smoke, drink excessively, don't exercise and am obese, it might be fair that I pay more of my health insurance costs than a person who maintains their health.

Currently, under the 1996 Health Insurance Portability and Accountability Act (HIPAA), a group health plan may not discriminate among individuals on the basis of health

factors by varying their premiums. Moreover, the law states that even where attainment incentives meet these standards, they must not exceed 20% of the total cost of an employee's coverage (i.e., the combination of the employer's and employee's contributions).

The new healthcare legislation—the Patient Protection and Affordable Care Act (PPACA)—underscores the government's belief that reasonable and HIPAA compliant attainment incentives are both ethical and effective. In 2014, the PPACA raises the cap on attainment incentives to at least 30 percent and up to 50 percent.

The research is convincing where incentives impact short-term participation in wellness programs. There is also compelling evidence that incentives are effective in smoking cessation, weight loss and in the amelioration of other preventable health conditions. Where the research remains inconclusive, is in the effects of incentive programs on promoting long-term, sustained wellness.

Because few controlled, long-term behavioral studies have attempted to determine whether people who receive incentives are able to maintain their short-term success long term — the ultimate goal of incentive-based prevention program — this remains the largest gap in incentives driven wellness research. Additionally, few attempts have been made to address how the design of an incentive program should be adjusted according to the demographics of the target population, such as insuring that low-income participants have equal opportunity to participate. Research initiatives into these areas would add value to the body of existing research.

> *"Motivating, engaging and empowering individuals to become better stewards of their own health has never been easy work."*
>
> - Care Continuum Alliance, 2011

INTRODUCTION

The term "wellness" is not defined or used consistently around the world. Generally, "workplace wellness" refers to programs designed to improve the health and well-being of employees (and their families) in order to enhance organizational performance and reduce costs (see also Appendices A and B). Wellness programs typically address specific behaviors and health risk factors, such as poor nutrition, physical inactivity, stress, obesity, and smoking. Wellness programs can also help reduce the incidence and severity of chronic illnesses such as asthma, diabetes, insomnia and heart disease. Employers often integrate their wellness initiatives with chronic disease management programs to provide a continuum of healthy lifestyle support.

Wellness programs raise awareness, provide information and education, and usually offer incentives that encourage employees and their families to adopt healthier lifestyles. These initiatives are most successful in a workplace environment that, at its core, promotes and supports health and well-being. The health issues that wellness programs generally target commonly lead to serious and expensive health problems and have a negative impact on workforce productivity. They are also, largely preventable.

> *"Given the vast number of preventable deaths associated with smoking (465,000 per year), hypertension (395,000), obesity (216,000), physical inactivity (191,000), high blood glucose levels (190,000), high levels of low-density lipoprotein cholesterol (113,000), and other dietary risk factors, there are huge opportunities to enact policies that could make a substantial difference in health system performance—and in the[U.S.] population's health."*
>
> - New England Journal of Medicine, January 6, 2010

The Scope of the Problem

For almost 50 years, healthcare spending has grown by 2 percentage points in excess of GDP growth across all Organization for Economic Co-operation and Development (OECD) countries. As a result, health care has become a much bigger part of most of these economies. If current trends persist to 2050, most OECD countries will spend

more than a fifth of GDP on health care. Even if the excess growth of health care spending over GDP is somehow cut in half, according to a 2008 McKinsey report, "health care will, by 2100, be the world's largest economic sector—and in many countries, the largest economic problem." [1]

U.S. healthcare costs are growing at an even faster rate than the OECD average and much faster than inflation, the economy, or wages. Costs have increased 274 times since 1950 even though the average cost of all other goods and services increased only eight times. In 2009, combined healthcare spending in the U.S. amounted to $2.5 trillion, or 17.6 percent of GDP. The Congressional Budget Office predicts that if trends continue, healthcare will consume 25 percent of GDP by 2025 and one-third by 2040.[2] For all this, the US ranks, at best, 37th in global life expectancy – in part due to a focus on treatment over prevention. (WELCOA, 2009)

Solutions to spiraling healthcare costs may be an economic survival imperative for the U.S. and many other nations. Certainly, accelerating healthcare insurance costs have become a critical, board-level issue for many U.S. organizations. Thus, the rise of workplace wellness programs and initiatives over the past two decades is no surprise. Yet the problem is far from solved. Despite the clear benefits to better health choices and individual wellness, America is an overweight, obese, inactive and sick nation.

[1] Health care costs: A market-based view, McKinsey Quarterly, Sept 2008 (https://www.mckinseyquarterly.com/Health_care_costs_A_market-based_view_2201)

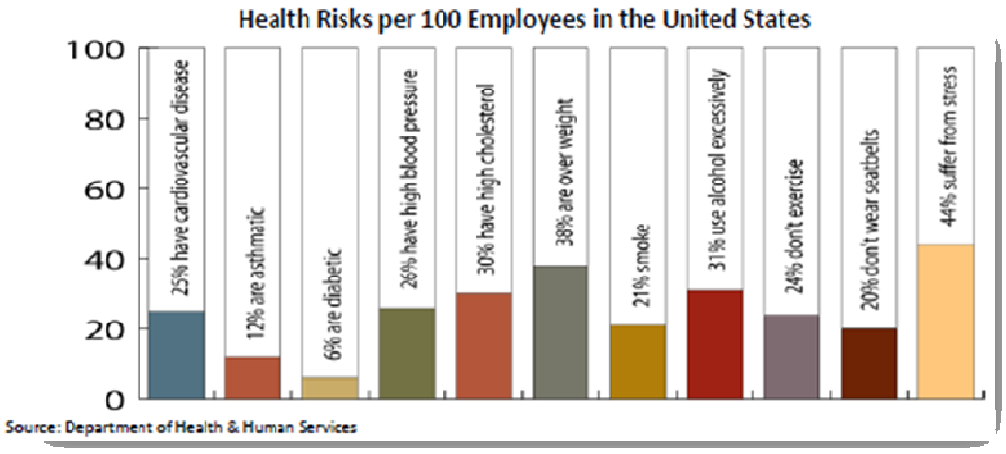
[2] Economic Report of the President to Congress, 2010 Ch.7 "Reforming Health Care", p.182.

THE STATE OF WORKPLACE WELLNESS PROGRAMS

Costs: The Key Driver of Workplace Wellness Programs

The silver lining in the otherwise depressing American health scenario is that the vast majority of healthcare spending is avoidable. Americans and the populations of most "western" countries are largely responsible for their own poor health in the choices they make. This represents an enormous opportunity for improvement. Figure One illustrates the primary health risks of American workers.

Figure One: Health Risks per 100 Employees in the U.S.



According to Mercer HR research, health insurance reached an average of $5,646 per employee in 2002, up 56% from 1997. From 1998 to 2008, the real average total cost of employer-sponsored health insurance for a family policy rose by more than 69 percent (Kaiser Family Foundation and Health Research and Educational Trust 2009). Appendix C summarizes the most common preventable health conditions and their costs.

As referenced above, the U.S. currently spends about $2.5 trillion per year on healthcare. If 75% of that is spent on preventable conditions, as many experts suggest, then the overall savings potential through preventative healthcare, including workplace wellness programs is almost $1.9 trillion dollars per year and this does not include productivity gains nor quality of life improvements for the workers themselves.

Current and Future Trends in Workplace Wellness Program Adoption

A 2008 survey by Hewitt Associates found that 93% of major companies (5000+ employees) sponsor some form of a worksite wellness program. The primary reasons cited for company sponsorship were: to promote health (45%); reduce health care costs (34%); improve morale (31%) and productivity (21%); and aid retention (32%) and recruitment of employees (28%).

In its 2010 analysis, *Population Health Improvement: A Market Research Survey*, the Care Continuum Alliance reported that "89 percent of surveyed health plans and health systems offer wellness programs. Further, 61 percent of current purchasers [of vendor-supported wellness programs or services] view wellness programs as a 'must have' within their organizations, and 89 percent of purchasers predict a trend toward more wellness programs within their organizations.[3]

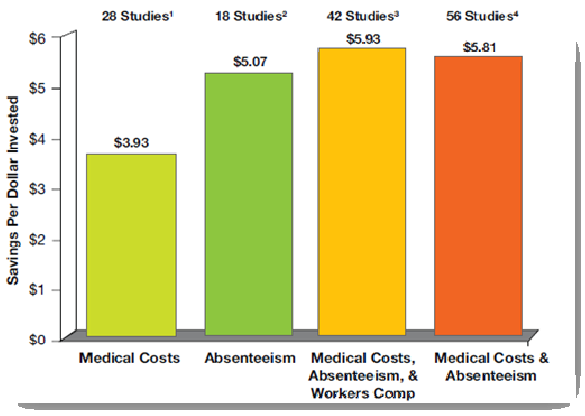
While the studies may differ in their assessment of workplace wellness program adoption (likely due to varying definitions) they all point to a trend toward greater implementation of the programs over the past decade or so. The reasons for broader adoption of wellness programs are varied but include the compelling evidence of a strong ROI in wellness programs.

[3] "Outcomes Guidelines Report, Volume 5", Care Continuum Alliance, 2010

THE ROI IN WORKPLACE WELLNESS PROGRAMS

The short-term return-on-investment (ROI) for corporate wellness programs has been well-documented over the past two decades. Year-round comprehensive corporate wellness programs have shown savings-to-cost ratios of more than $3 saved for each $1 invested (see Figure Two). Documented savings based on meta-analysis of numerous research studies are observed in medical costs, absenteeism, worker's compensation costs, short-term disability, and increased productivity.

Figure Two



Source: American Institute for Preventive Medicine

Examples of positive ROI are plentiful even though most organizations do a poor job of tracking it. Below are some examples of typical ROI:

Johnson & Johnson, which started its first wellness program in 1979, saves an estimated $9 to $10 million per year from reduced medical utilization and lower administrative expenses in its Healthy People program. J&J reports that "Our focus on health and wellness among our U.S. workforce has helped reduce per-capita health-

plan costs by $400 per employee per year (based on 2007 data) and significantly improved overall employee health and productivity." [4]

- Citibank's comprehensive health management program demonstrates that for every dollar invested in programming activities, $4.56 to $4.73 is saved in reduced health care costs.
- Union Pacific Railroad's medical self-care program achieved cost savings of $2.78 for every dollar invested by reducing inappropriate emergency room and outpatient visits.[5]

In a meta-analysis of the literature on costs and savings associated with workplace disease prevention and wellness programs, Harvard researchers led by Katherine Baicker recently reported that medical costs fall by about $3.27 for every dollar spent on wellness programs and that absenteeism costs fall by about $2.73 for every dollar spent. (New England Journal of Medicine, 2009).[6]

In perhaps the most rigorous research conducted on workplace wellness program ROI to date, researchers for the MEDSTAT group followed over 8,000 employee participants of Johnson & Johnson's Health & Wellness program for about nine years (five before the program and four after). Using regression techniques to isolate the impact of the wellness program, the researchers concluded that: "a well-conceived health and wellness program that focuses on prevention, self-care, risk factor reduction, and disease management can produce substantial benefits for employers and their employees. Utilization and expenditures may be reduced by better coordination of existing health and productivity management programs, with many of these benefits occurring in later years." [7]

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[4] See: http://www.jnj.com/connect/caring/patient-stories/focusing-wellness-prevention

[5] See: http://www.jnj.com/connect/caring/patient-stories/focusing-wellness-prevention

[6] https://www.way2employeehealth.com/WellnessCost.aspx

See also Aldana, SG, "Financial Impact Of Health Promotion Programs: A Comprehensive Review Of The Literature," in the American Journal of Health Promotion; Musich SA, Adams L, and Edington D, "Effectiveness Of Health Promotion Programs. Moderating Medical Costs In The USA, in Health Promotion International; and Keller PA, Lehmann DR, and Milligan KJ, Effectiveness Of Corporate Well-Being Programs: A Meta-Analysis, in the Journal of Macromarketing.

[7] The long-term impact of Johnson & Johnson's Health & Wellness Program on employee health risks. Goetzel RZ, Ozminkowski RJ, Bruno JA, Rutter KR, Isaac F, Wang S., Research and Policy Division, MEDSTAT Group, Inc,

The most relevant question for organizations today appears not to be whether they should offer wellness programs, but according to Baicker and her colleagues, "rather how these programs should be designed, implemented and evaluated in order to achieve the best outcomes." [8]

The Role of Incentives, Rewards and Recognition in Workplace Wellness program design and in Driving & Sustaining participation and Interest

As above, preventable medical conditions represent an unsustainable drain on the nation's finances. Workplace wellness programs address this challenge and normally achieve 300% or greater ROI. Thus, the more employees who participate in a wellness program, the more potential savings and the better their quality of life.

Hence companies have tried a variety of methods to increase employee participation, some of which have proven more effective than others. Mandatory employee participation, for example, may backfire. When a railroad company tried to require its track maintenance employees to do warm-up exercises, the workers threatened to strike unless the program was halted immediately.[9]

While the stick is sometimes appropriate, positive incentives, rewards & recognition have become a part of most wellness programs in the United States today – the rewards offered are both financial and non-cash (i.e. gift cards, merchandise, travel, time off, even simple praise).

The results of an Aon Hewitt survey released in June 2011 found that "the inability to motivate and change habits has prompted concern" among employers. The report cited 56% of respondents who said that "motivating participants to change unhealthy

[8] "A Review of health related outcomes of multi component worksite health promotion programs", American Journal of Health Promotion – March/April 1997)\ Journal of Occupational and Environmental Medicine, 2002;44:21–29

[9] Health Promotion Incentives: How Well Do They Work?, Corporate Wellness Incentives, January 10,2009

behaviors is the most significant challenge to accomplishing 2011 health-care program goals.[10]

According to Health2 Resources 2008 survey of the membership of the National Association of Manufacturers (NAM) and the ERISA Industry Council (ERIC) between 2007 and 2008, employers offering incentives for health and wellness or disease management programs, rose from 62 percent to 71 percent.[11]

Types of Incentives Used

By far the most common incentives are used to encourage participation in a wellness program including the upfront Health Risk Analysis (HRA) and for actions such as attending fitness classes, receiving immunizations and reducing or stopping smoking. Generally, rewards for participation range from cash to gift cards to merchandise. According to a 2007 report from the Kaiser Family Foundation, about 6 percent of firms vary premium contributions based on employees' participation in wellness programs, up from 3 percent in 2005. Differential premiums can be controversial, especially when they reward not only for participating in a wellness program but for outcomes or "attainment".[12]

Some employers have begun varying the premiums paid by their employees for health insurance based on health outcomes or attainment of goals. This approach has been endorsed to some degree by Congress and the White House in the Patient Protection and Affordable Care Act of 2010 (PPACA) which permits employers to offer cash incentives to employees for participating in wellness programs and for reaching certain targets. Current law limits the value of wellness incentives to 20 percent of the total health care premium spent per worker. When the new rules of the PPACA go into effect in 2014, limits will go up to between 30 and 50 percent.

[10] 2011 Health Care Survey", Aon Hewitt (see: http://img.en25.com/Web/AON/Aon%20Hewitt%20Health%20Care_Survey_2011_Final%5B1%5D.pdf)

[11] Employee Health & Productivity Management Programs: The Use of Incentives, a Survey of Major U.S. Employers, Katherine Capps, Health 2 Resources, John B. Harket Jr. PhD, Harkey Research, Spring 2008

[12] 2007 Employer Health Benefits Survey. Henry Kaiser Family Foundation

Safeway is perhaps the organization best known for the use of differential premiums as incentives for wellness and is reputably the model for the incentives component of the PPACA described above. Safeway has instituted a program with substantial differences in premiums, depending on employees' healthiness. The company's health care plan also uses differing premiums, based on various factors such as smoking, weight, blood pressure, and cholesterol levels. Employees are screened for those four items, and they receive a discount off the base level premium for each test they pass or standard they meet.

The attractiveness of Safeway's approach (and the emphasis on differential premiums in the PPACA) is obvious. In theory, if one requires workers to pay higher premiums if they fail tests for measures such as smoking, weight, blood pressure and cholesterol, they will want to become healthier to reduce their costs. When they do, the employer gets a fitter and healthier workforce and reduces medical expenses and absenteeism. Employees benefit in the form of lower deductibles and premiums.

In practice, Safeway's results are impressive in most areas but marginal in others. According to Safeway's statistics, the proportion of employees classified as obese declined by five percentage points between 2005 and 2009, while the proportion who were overweight declined by one percentage point. Meanwhile, 40 percent of workers and spouses who failed the blood pressure test in 2008, passed in 2009; 30 percent of former smokers registered as tobacco-free, and 17 percent who failed the cholesterol test in 2008 passed in 2009.

The financial ramifications remain unclear. In the short term, Safeway admits its program probably boosts medical expenses at first because the screenings prompt people to seek treatment for newly detected problems.

> *"RedBrick Health appeals to everyone's sense of fairness. We can now directly link the cost of employees' health care benefits to an individual's decision to engage in healthy behaviors within their control. We're not forcing anyone to change his or her behavior. Instead, we're simply saying the cost of coverage should be responsibly aligned with personal health choices. We look forward to helping our employees reap the personal and financial benefits of healthy behaviors through RedBrick's health resources and tools."*
>
> - Jim Conseco: Grace Brothers, Vice President of Benefits

International Truck and Engine Corporation uses participation and attainment incentives to encourage high Health Risk Assessment (HRA) participation and to triage employees into primary, secondary and tertiary health promotion/disease prevention programs. International's smoking policy was a by-product of this initiative. Over half of the employees that identified themselves as smokers actively participated in the smoking cessation course or quit smoking entirely.

Longitudinal study results at International, consisting of three separate retrospective surveys initiated in 2000, 2002 and 2004 indicate five-year estimated savings of $13.4 million with an investment of $1.2 million, resulting in a net savings of $12.1 million. The investment costs include staffing, handbooks (plus the shipping and handling fees) training, communication materials, incentives (including participation and attainment rewards) and early detection screenings in 2000 and 2003.

Since International funded the cost of the initiative, the return-on-investment (ROI) for each year was calculated from the plan paid perspective. As such, the estimated plan paid ROI for the five-year period was $9.70 for each dollar invested.

ROI is not the only consideration, however. Writing in a recent issue of the New England Journal of Medicine, Harald Schmidt and colleagues argue that "[Attainment incentives] might be fundamentally unfair because they might be only technically voluntary, out of reach for the socio-economically disadvantaged, a burden on the doctor-patient relationship and, ultimately, a source of higher out-of-pocket insurance premium costs for the very people who can least afford them".[13]

Nonetheless, 56 percent of employers plan to hold employees accountable for a larger share of health plan costs according to a 2010 Towers Watson study. With costs escalating, it is likely that employers will pursue attainment related incentives and disincentives aggressively within the bounds of the law. In addition to being convinced that such incentives work, some employers see a way to pay for their wellness programs entirely through this strategy.[14]

[13] See: http://healthaffairs.org/blog/2010/01/19/why-wellness-incentives-belong-in-the-workplace/

[14] "Don't Touch That, It's Hot", Jim Pshock, CDHC Solutions Magazine, 2008

THE ROI IN INCENTIVES-DRIVEN WELLNESS PROGRAMS

The debate over the use of incentives in promoting workplace wellness will no doubt continue for years to come. For most organizations, communities and nations, however, evidence of the ROI in incentives-driven wellness programs will be the determining factor in their use, and the evidence is mounting in favor of the use of incentives – for those using both cash and/or non-cash rewards.

A 1991-95 study of 714 employees of the county government of Salt Lake City, who participated in a Healthy Lifestyle Incentive Program (HLIP) offers additional evidence in support of the use of incentives. The program allowed participants to earn points for engaging in a healthy lifestyle — behaviors such as exercising, wearing seat belts, not smoking, reducing or maintaining desirable blood pressure, cholesterol and body fat levels, having routine preventive exams and engaging in various educational activities on healthy lifestyle topics.

> *"If we learn that incentive programs are less cost-effective than alternative means of promoting cardiovascular health, or that they carry unintended consequences such as encouraging certain people to adopt unhealthy behaviors so as to become eligible for incentives, then broadly implementing these interventions may be unwise. But given the promise of incentives to favorably modify behavior, we should not let inchoate views that the incentives themselves are unethical prevent us from studying them in earnest."*
>
> *- American Heart Association, 2009*

Annual rebates ranged from $75 to a max of $300 with an average of $102. Even though the rewards were modest, modifiable health risks were significantly reduced over time, both among higher and lower risk participants. Obesity prevalence decreased significantly among men and women. High cholesterol and high blood pressure, seat belt use, smoking cessation and physical activity all saw significant improvements over the 4 year period, despite setbacks, in some cases, from year to year.

The size and type of incentive or reward can matter also. At Johnson & Johnson, for example, voluntary participation in its wellness program increased from 26 to 90

percent when non-cash incentives were offered. For some people, cash rewards, unless significant, can be less meaningful than the "trophy value" of a merchandise type reward.[15]

More recently, in May, 2011, The American Journal of Health Promotion published the results of a longitudinal study conducted by Discovery Vitality in which 300,000 subjects were studied over a five year period. About 65 percent of the subjects participated in the Vitality Wellness program over the five year study, while about 35 percent did not.

The differences between the two groups were significant. Wellness program participants were more likely to join fitness activities and remain engaged in those activities over time. Those that were active in fitness activities experienced significantly lower hospital costs than those that were inactive.[16]

Whether cash or non-cash, setting the incentive level is a design science in itself. The right reward type and amount will vary based on the behavior change, participation objective or outcome desired and possibly by type of organization, employee cohort, or a range of other factors.

Research Gaps and Recommendations for Further Research

There is strong evidence that employees prefer to work for firms that offer effective and attractive benefit programs. However, though a minority, many employers are still reluctant to implement incentive-driven wellness programs - especially with meaningful incentive dollar values - because they believe a compelling "business case" for such investment has not been made or they fear developing a "culture of entitlement" where wellness and health outcomes aren't driven by intrinsic motivations because

[15] "Big Fat Truth About Use of Incentives For Wellness Programs", George B. Delta, General Counsel, The Incentive Foundation Inc. (see: http://www.cdhcsolutionsmag.com/en/communities/rewards_and_incentives/big-fat-truth-about-use-of-incentives-for-wellness_gl1os3yd.html)

[16] "*New Study Shows Incentive-based Wellness Programs Can Produce Cost-Saving Behavior Change*", The Vitality Group, May 2, 2011

participants learn to expect rewards for everything they do and achieve. To address this need:

- Further research is needed to determine which incentive structures and amounts are optimal, assess the ability of incentives (both contingent and intrinsic) to produce sustained behavior changes, and evaluate the cost-effectiveness of implementing incentive programs.
- Further research is required to determine the degree to which incentive rewards within workplace wellness programs promote robust, long-term behavior change and whether (and to what degree) incentives that are linked to behavior outcomes result in greater ROI than incentives for participation.
- More research is needed to better determine the interaction between the intensity of interventions and incentives offered and the duration of a program as it relates to the level of ROI that can be expected.
- A constraint also seems to be with the low cash incentives used in programs. A study using higher rewards could be feasible if conducted in a low cost country.
- Future research needs to more systemically examine the contextual factors in the workplace, such as the culture, senior management commitment, marketing of the program and incentives to discover how they may be linked to participation in health promotion activities. The study might also address how the design of an incentive program should be adjusted according to the demographics of the target population, such as insuring that low-income employees have transportation to attend classes and fitness facilities.
- More research is needed on the optimal mix and level of cash (financial) and non-cash rewards. Does merchandise leave a longer lasting impression on recipients than cash? Do non-cash incentives drive the desired behavior and outcomes as well or better than cash? How can cash and non-cash incentives

> *"Given a wellness program's cost, scope, duration and number of participants, and given the availability (or non-availability) of claims data and of an appropriate control group, what program evaluation design is indicated, such that the additional cost associated with the additional rigor is warranted and can be justified by higher quality of data that results?"*
>
> - CCA, 2010

support the need to develop intrinsic motivations for wellness? To what extent do the tax implications of non-cash rewards impact employees' acceptance of them in lieu of premium reductions and financial incentives that carry no tax liability?

- What role do broader societal and cultural attitudes play in workplace wellness? How might attitudinal change efforts impact larger populations and workplace wellness?

According the Care Continuum Alliance (CCA): it boils down to this question: "Did this program result in better health, lower health care costs and increased productivity and quality of life among those participating in the program?" From an incentives perspective it would be important to add: to what extent, if any, did the incentives and rewards component of the wellness program drive better health, lower health care costs and increased productivity and quality of life among those participating in the program? Other questions might include: Did some types and amounts of incentives and rewards have more impact than others? Is the ROI in the use of incentives and rewards positive? Which types of incentives and rewards generated the greatest ROI?

In an ideal world a study to answer these questions would be designed with a randomized controlled trial (RCT) using control groups to test a variety of design approaches and interventions. This kind of study is rare for several reasons, cost and practicality chief among them. However, such a study would provide the best evidence of causality, the best estimate of effect sizes and ultimately the best evidence as to whether meaningful outcomes are positively affected by the use of incentives and rewards (and types) in wellness programs.

CONCLUSIONS

Most Americans are employed and spend a significant amount of their time at work. Therefore, workplace wellness programs play a critical role in addressing the nation's costly healthcare system and in making Americans healthier, happier and more productive.

Paradoxically, despite an avalanche of health and wellness information in the press, on TV and over the world wide web (to name a few) Americans remain an unhealthy lot. The evidence is all around us that merely knowing something is bad for one's health, or conversely, good for one's health, is insufficient to motivate the majority of us to make healthier decisions.

This ubiquitous and very visual evidence is supported by a rich body of research and case studies which demonstrate that fewer than 1 in 5 employees will participate in a workplace wellness program that does not offer rewards (or sticks). On the other hand, more than 4 in 5 will participate where incentives and rewards are offered. Logically then, at least for the time being, rewards are an essential element of wellness program design.

The questions that remain are what rewards? What mix and amount of cash, non-cash, attainment-based and punitive-type incentives motivate workers most efficiently and effectively? And what mix works best for different types of workers? What incentives and rewards generate the greatest business impact and ROI?

These and other related questions remain open such that further research is necessary in order to guide organizations in creating the most effective workplace wellness programs possible. Therefore, if you have interest in the support of, or participation in, further research on the use of wellness program incentives, please contact the Incentive Research Foundation: http://theirf.org/contact/

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APPENDIX A: WELLNESS PROGRAM DEFINITION (CCA, 2010)

According to the Care Continuum Alliance (CCA), Wellness programs are designed to:

- help individuals maintain and improve their level of health and well-being by identifying health risks and educating them about ways to mitigate these risks;
- increase awareness of factors that can affect health and longevity;
- enable individuals to take greater responsibility for their health behaviors;
- prevent or delay the onset of disease; and
- promote healthful lifestyles and general well-being.

Effective wellness programs employ a variety of behavior change techniques and lifestyle management strategies.

The following are examples of wellness program components (note that this list is not exhaustive):

- Health risk appraisal
- Biometric screening (e.g., blood pressure, cholesterol)
- Smoking cessation
- Weight loss
- Diet and nutrition
- Stress reduction
- Exercise and fitness programs
- Ergonomic programs
- Safety (both at the workplace and home)
- Sleep hygiene
- Health advocacy
- Disease screening
- Immunization

APPENDIX B: WELLNESS PROGRAM LOGIC (CCA, 2010)

The logic of wellness programs, is straightforward. That logic can be expressed in narrative form as follows:

1. Modifiable risk factors and behaviors are known to have effects on clinically important biometric variables, such as blood pressure, body mass index (BMI), serum lipids/cholesterol, serum glucose, etc.

2a. These biometric variables are, in turn, associated with the development or exacerbation of specific disease states, such as heart disease, cancer, stroke and diabetes. Utilization of health care services to address these conditions results in costs to the health care purchaser.

2b. As well, productivity and quality of life can be adversely affected by these risk factors directly and indirectly by the associated diminished health status.

3. As a result, a program that targets the modifiable risk factors should result in a healthier and more productive population, and reduced health care costs.

APPENDIX C: THE ESTIMATED COSTS OF PREVENTABLE CONDITIONS (U.S)

Condition/Activity	Direct Costs	Indirect Costs	Other
Smoking	$96.7 billion (Campaign for Tobacco-Free Kids)	$97.6 billion in lost productivity	- $3,400 per person/yr (NEJM, 2009) - $2 per pack of cigarettes - $50 billion (CDC, 1998) - $630/yr per family in federal and state taxes due to smoking.
Obesity	$13 billion in 1994 (National Center for Policy Analysis) $61 billion (Success Performance Solutions 2004)	$56 billion ($61 billion (Success Performance Solutions 2004)	- $147 Billion for obesity-related medical costs in 2008 (National Institutes for Health) - $3.9 billion loss in productivity related to obesity (Success Performance Solutions 2004) - $150 billion annually (NY Times, 2011)
Diabetes (Note: some costs of diabetes may be included in cost for obesity above)	$92 billion in 2002 ((Success Performance Solutions 2004)	$40 billion in 2002 ((Success Performance Solutions 2004)	-Annual healthcare costs of $10,385 per employee with diabetes compared to $2,411 for those without (2003, International Truck and Engine Corporation) - Annual er capita cost of health care for persons with diabetes: $10,071 in 1997 to $13,243 in 2002, compared with $2,560 in 2002 for persons without diabetes (Success

Condition/Activity	Direct Costs	Indirect Costs	Other
			Performance Solutions 2004) - Type 2 diabetes is projected to cost $500 billion a year by 2020 (NY Times, 2011)
Alcohol Abuse			- 500 million lost work days annually (3.3 to 8.3 times more than average) US Dept. of Labor - Family members of alcoholics and substance users use ten times as much sick leave and have higher than average health care claims than family members of non alcoholic and substance using families. (HSS and NCADD Fact Sheet) - 60% of alcohol-related work performance problems can be attributed to employees who are not alcohol dependent, but who occasionally drink too much on a work night or drink during a weekday lunch. (JSI Research & Training Institute)
Seat Belt Use	- Approximately $20 billion per year. 74% charged to the public (Natiuonal Safety Council) - $26 billion annually in medical care, lost productivity		On average, inpatient hospital care costs for an unbelted crash victim are 50 percent higher than those for a belted crash victim. Society bears 85 percent of those costs, not the individuals involved. Every American pays about $580 a year toward the cost of crashes. If everyone buckled up, this figure would drop significantly.

Condition/Activity	Direct Costs	Indirect Costs	Other
	and other related costs. (National Highway Traffic Safety Administration)		By reaching the goal of 90 percent seat belt use, and 25 percent reduction in child fatalities, we would save $8.8 billion annually. (Car Accidents.com)
Stress		More than $300 billion annually (American Institute of Stress)	- $300 billion annually (international stress management Association 2004) - Workers who report they are stressed incur health care costs that are 46 percent higher, or $600 more per person, than other employees. *(NIOSH)*
Lack of Exercise	$8.9 Billion in 2002 in Michigan (state officials)		Employees who exercise once a week have health care costs of $680.20 annually compared with $1,360.40 for those who don't, (SEBS).
Heart Disease	$273 billion in 2010 to more than $800 billion in 2030 (American Heart Association)		$475.3 billion direct and indirect costs in 2009 (American Heart Association)
Preventative Diagnosis and Care	$6.1 billion annually for osteoperosis (National Committee for Quality		The cost for postnatal care for women who didn't receive prenatal care was $2,341 more than for women who had. Direct and indirect costs of stroked: $41 billion annually (about $50,000

Condition/Activity	Direct Costs	Indirect Costs	Other
	Assurance) $21 billion for vascular hospitalizations in 2004 (US Census data)		per person) - (National Committee for Quality Assurance)

APPENDIX D: THE DESIGN OF EFFECTIVE WORKPLACE WELLNESS PROGRAMS

By any measure, and despite the rarity of controlled experiments, there is overwhelming evidence that wellness programs work and generate significant ROI. But no single component makes for a successful wellness program. The critical question is how successful programs are designed. Program designers generally agree on several critical components to a successful wellness program:

Culture: The work environment and culture plays a key role in the success and sustainability of any wellness program. The leaders of the organization should be seen to participate in and support the effort. Cultural conflicts occur, for example, when a wellness program is implemented in a work environment that is toxic and stressful. Even where the company cafeteria offers very few healthy eating options, the wrong message is sent. Is the work environment smoke free? Are walking and other wellness activities encouraged during work hours? Do vending machines have healthy options? Are leaders mindful and considerate of employees' health? Do employees believe the company cares about their health or just about saving money?

Executive Example: Employees notice if supervisors and managers are committed to building a healthy, high performance culture. They notice if leaders live the corporate values. Seek an executive champion to chair your cross-functional wellness committee. Be careful where executives might participate in contests or "challenges" in which they compete with other staff to achieve wellness targets. In some cases, this level of participation has caused resentment when executives win the contests.

Long-Term View: It takes about three years of participating in a wellness program to see a reduction in medical claim costs according to experts such as Robert Van Eck, associate vice president of clinical quality improvement for Priority Health, in Grand Rapids Michigan. "It takes times for people to learn new behaviors and for behaviors to affect medical costs," according to Van Eck. The American Journal of Health Promotion, says ""results from [our] review and others strongly suggest that a program must be

sustained for a minimum of 3 to 6 months to bring about health risk reductions and 3 to 5 years to demonstrate cost-effectiveness." (Nov/Dec 2001 issue)

Communications: First, document the purpose and mission of your wellness program (primarily to help employees become healthier; secondarily, to manage costs). Organizations should communicate their programs and the reasons for them thoroughly and regularly. A communications plan might consist of newsletters, posters, email campaigns, intranet announcements, a wellness portal, health fairs, health education, on-site medical screenings, health coaching, wellness webinars and/or lunch & learn sessions and on-site fitness demonstrations. Include educational programs designed to change employees' behavior in order to achieve better health and reduce the associated health risks. Local hospitals and clinics may also be willing to present to your employees at no cost.

Confidentiality of Data: Employees may be skeptical when their company hires an outside consultant or supplier to review insurance claims and contact employees to offer health-oriented services. To head off problems, companies should spread the message that an employer sees only aggregate data, not individual results, and that employee privacy is protected by law (Michael Wood, a Watson Wyatt senior health and productivity consultant).

Incentives & Rewards: As is discussed in the paper, most practitioners and experts believe that incentives and rewards are a critical element of effective workplace wellness design. While some people may not require rewards to participate in health screening, fitness programs and efforts to stop smoking, for example, research has shown that participation in non-incentivized programs runs about 15 percent, while participation in programs that include sufficient incentives can attract 85 percent participation or better. While incentives and rewards contingent on program participation and/or outcomes are likely essential to wellness programs, designers must be mindful of the need to encourage intrinsic motivations as well. Otherwise, contingent rewards in wellness programs might become addictive, requiring ever greater and costlier incentives to drive continued success over the long-term. Designers should also measure the costs of incentives and rewards versus the savings generate by better

participation and outcomes. In doing so, a simple ROI analysis will determine whether the cost of the incentives is more than offset by the savings.

Employee Engagement: Incentives, rewards, recognition, plus a good communications plan and executive involvement, go a long way to engaging employees in a wellness program over a sustained period of time. Organizations should also include an element of coaching, counseling and wellness advice. The AJHP (March/April 1997) reported that in addition to health screening and standard risk reduction, when individualized counseling was added to health screening and standard risk reduction advice, several of the desired results occurred (weight loss, body fat reduction and more smoking cessation). Be sure to include employees' family members in your program.

Individualization: Programs should be inclusive of all employees but there are numerous reasons to offer customized wellness programs, especially where incentives are concerned. No two employees are driven by the exact same motivations. Nor should two very different employees be challenged to achieve the same cholesterol goal to achieve a reward, for example. Instead assess each person. An older, morbidly obese person might be very discouraged if faced with the same goals as a younger, moderately overweight person. To maximize program participation, flexible options are essential.

Participation Options: Offer multiple options to participate, for example, a variety of exercise options. While an organization may have on-site fitness, working out at the office may not appeal to everyone. Offer discounted gym memberships, or if possible, offer the employee at-home options. While some corporate wellness programs are administered online only and are completely self directed, the best programs offer several options such as the ability to communicate by phone, via secure message or at on-site events. A targeted personal outreach program allows high-risk individuals to be engaged more often.

Vendor Management: Organizations seeking the help of wellness consultants, technology providers, rewards fulfillment partners, etc. should become knowledgeable about the vendor landscape. The first step is to develop a list of vendor qualifications

which include, first and foremost, shared values—especially those related to customer service. Essentially, organizations need a vendor who can become an extension of their team and who can grow synergistically with them as their wellness offerings grow.

Measurement: Much like any part of business, result measurements hinge on meaningful data. Create a baseline through tools such as Health Risk Assessments, weigh-ins, blood pressure and BMI data to better understand the priorities (needs of employees) and then track improvements. Use credible processes such as the ROI Methodology[17] to isolate the impact of the wellness initiatives on cost savings and productivity improvements, and to estimate ROI. Communicate goals and celebrate the achievement of targets.

Verification: Where incentives and rewards are offered for outcomes, employee attainment of those outcomes should rely both on an honor system for some elements and verification for others. At present, more companies than not rely entirely on an honor system, with the employee simply signing a form to "prove" that he's done the incentivized activity. Although most companies do not do specific tests to see if the employee is telling the truth--like testing the blood of an alleged non-smoker for nicotine--it's clear that, in the case of smoking and exercise, particularly, outright lying will probably occur. Allowing the program to be gamed and cheated will undermine its credibility.

Legality: Due to the complexity of existing and changing legislation contained in the Genetic Information Nondiscrimination Act (GINA), the Health Insurance Portability and Accountability Act (HIPAA), the Americans with Disabilities Act (ADA), PPACA and others, it is advisable to have wellness programs reviewed by a qualified attorney.

[17] www.roiinstitute.org

APPENDIX E: WELLNESS PROGRAMS AND EMPLOYEE ENGAGEMENT

According to a 2007 Watson Wyatt report "Staying @ Work" "employee morale measurably improves in 56% of the companies that offer wellness programs ".

According to the AJHP (March/April 97) "The extent to which employees believe that their organization is concerned about employee health, the extent to which employees are awarded the flexibility necessary to participate in worksite health promotion programs, and the extent to which employees perceive their supervisors and co-workers as having positive attitudes toward health have all been associated with employee health behaviors and levels of symptomatology."

Jackson Kelly La Firm, West Virginia says: "Ultimately, wellness is a mixture of tangible, measurable elements (like costs) and more intangible, elusive elements (like happiness). To reach those intangibles, a firm must care about its people, not just the bottom line. With a deep sense of appreciation for the individual. To succeed we must pay attention to those around us; we must try to know them, to appreciate their strengths and weaknesses, to care about their lives and families and help them grow. Everyone at Jackson Kelly, from the CEO to mail clerks, is considered when developing plans for the well-being of the 'family.'"

Employees need to be engaged in their work and enabled to be productive and successful. One of the tools that employers have at their disposal is the health status of their own employees. One of the best ways to encourage engagement of employees is make them realize that the employer is interested in and cares about the health and welfare of both the employee and the employee's family. (Hay Group, 2009)

According to Gallup, "…among engaged employees, a clear majority -- 62% -- feel their work lives positively affect their physical health. That number plummets to 39% among not-engaged employees and 22% among the actively disengaged. More alarming is the fact that a majority of actively disengaged employees -- 54% -- say they think their work lives are having a negative effect on their physical health. Thirty percent of not-

engaged employees and just 12% of engaged employees say the same. But the differences by engagement level are even more dramatic: 78% of engaged workers feel their work lives benefit them psychologically. Just under half (48%) of not-engaged employees and a meager 15% of actively disengaged employees say the same. Conversely, just over half (51%) of actively disengaged employees feel their work lives are having a negative effect on their psychological wellbeing, compared to 20% of not-engaged workers and just 6% of engaged workers."

The Federal government is also promoting hybrid participation-type and outcomes-based incentives. A federal grant program authorized in the PPACA offers states $100 million to reward Medicaid recipients who demonstrate a commitment to quit smoking or keep their weight, blood pressure or cholesterol levels in check. To receive a reward (coupons, gift certificates, etc.) participants will have to demonstrate that they have enrolled in smoking cessation classes, for example. To receive more rewards, they would have to demonstrate behavior change (less smoking) and, ultimately, a successful outcome (quit smoking).[18]

In order to encourage employees to provide such information, Safeway uses outside parties to collect the data, and those parties are not permitted to share the collected information with company management. The confidentiality of such data is very important.

[18] Medicaid to Offer Rewards for Healthy Behavior, The Fiscal Times, April 11, 2011

APPENDIX F: NEW LEGISLATION IMPACTING WORKPLACE WELLNESS PROGRAMS

Under the 1996 Health Insurance Portability and Accountability Act (HIPAA), a group health plan may not discriminate among individuals on the basis of health factors by varying their premiums. This doesn't mean that participation incentives and even attainment incentives can't be used, rather that employees who are unable to participate or reasonably achieve the attainment goals must be able to opt out from the program with no consequences. As above, where attainment incentives are concerned, the law currently restricts their value to 20% of the total cost of an employee's coverage (i.e., the combination of the employer's and employee's contributions).

Economists who have studied health policy, including President Obama's Office of Management and Budget Director Peter Orszag, believe that attainment incentives are essential to encouraging people to meet health goals. Moreover, they believe that the 20 percent cap on attainment incentives is too little. As such and as noted previously, the new healthcare legislation (PPACA) raises the limit to at least 30 percent and as high as 50 percent in 2014.

Other components of the new law underscore the administration's belief in wellness initiatives and preventative healthcare.

- $7 billion in funding for fiscal years 2010 through 2015 and $2 billion for each fiscal year after 2015. (Effective fiscal year 2010) for a Prevention and Public Health Fund for prevention, wellness, and public health activities including prevention research and health screenings, and Education and Outreach Campaigns for preventive benefits, and immunization programs.
- A grant program to support the delivery of evidence-based and community-based prevention and wellness services aimed at strengthening prevention activities, reducing chronic disease rates and addressing health disparities, especially in rural and frontier areas.

- Provide Medicare beneficiaries access to a comprehensive health risk assessment and creation of a personalized prevention plan.
- Require qualified health plans to provide at a minimum coverage without cost-sharing for preventive services rated A or B by the U.S. Preventive Services Task Force, recommended immunizations, preventive care for infants, children, and adolescents, and additional preventive care and screenings for women. (Effective six months following enactment)
- Provide grants for up to five years to small employers that establish wellness programs. (Funds appropriated for five years beginning in fiscal year 2011)
- Provide technical assistance and other resources to evaluate employer-based wellness programs. Conduct a national worksite health policies and programs survey to assess employer-based health policies and programs. (Conduct study within two years following enactment)

The new PPACA legislation clearly communicates the administration's confidence in wellness plan incentives. And although the PPACA faces the determined opposition of the Republican party, including opposition to certain of its plan elements, its wellness and wellness incentive components appear to be embraced by representatives of both parties and most Americans.

APPENDIX G: RECOMMENDATIONS FOR FURTHER IRF-SPONSORED RESEARCH

In determining what research will have the greatest value and impact on the field, one must consider both the focus and expertise of the organization(s) sponsoring the research and the budget available. For example, while a five year study of the impact of incentives on wellness, health outcomes and ROI - especially one with control groups – would be largely unprecedented and extremely valuable, it may not be practical for nor service the needs of the sponsoring organization(s).

While valuable, the research might further "prove" the effectiveness of incentives and rewards in driving higher wellness program participation, in changing unhealthy behaviors or even motivating better health outcomes. More evidence of causalities between these connections would be academically valuable but may be of limited interest to corporate decision-makers who are already convinced of the effectiveness of incentives.

The Incentive Research Foundation is interested in the impact and ROI of incentives and rewards on workplace wellness programs, and, especially in how incentives and rewards contribute to the optimally designed wellness program. As a neutral, unbiased research sponsor, the IRF wants to present credible and actionable insights. Thus, the IRF may be an ideal sponsor of further research into incentive wellness program design – and especially to determine the optimal balance between cash and non-cash rewards. This research could gather credible data in several ways:

- A survey to determine the use of rewards and incentives in wellness programs, types of rewards and their impact and ROI (including the percentage of organizations that track impact and ROI)
- Expert interviews to better understand the implications of various rewards and incentives on the emotional/psychological differences, if any, between cash rewards and select merchandise type rewards. And on long-term erosion or enhancement of intrinsic motivations. Expert interviews would also expand on

best practices in wellness program design, including communications, executive support, vendor management, employee engagement, etc.

- Practitioner interviews to highlight and develop case studies in the application of various rewards, reward mixes, communications strategies, metrics, measurement, etc. – wellness program design.
- Focus groups to better understand what motivates employees to participate in wellness programs and strive to achieve wellness outcomes. For example, cash incentives vs. non-cash, premium reductions vs. enhanced coverage/free prescriptions/diagnostics, etc.
- Controlled experiments in which a random group of employed persons is offered the chance to participate in a wellness program. The experiment would offer segments of the group different incentive mixes or no incentives at all. This experiment could be done in the U.S. or in a low cost country in order to more practically test reward sizes on motivation.

To the extent possible, research that included several or all of the elements above would most likely offer a new and valuable contribution to the existing body of research, including insights into the optimal design of incentive-driven wellness programs, reward types and size and a better sense of the impact of cash vs. non-cash rewards in wellness programs for participation and attainment. If the controlled experiment approach were taken, additional insight and evidence might be obtained as to the difference in program success between incentivized programs and programs that offer no incentives or rewards.