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Frey, Bruno S.

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Center for Research in Economics, Management and the Arts

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Research on Well-Being: Determinants, Effects, and its Relevance for Management

Bruno S. Frey

University of Basel and

CREMA - Center for Research in Economics, Management and the Arts, Zurich

Abstract

Empirically orientated happiness research provides valuable and new insights to both business and political economics.

Managers can benefit from the knowledge gained regarding the determinants and even more from the consequences of subjective well-being. They should, however, not engage in directly trying to raise the happiness of stakeholders. Rather, they should lay the ground for the respective persons being able to reach happiness in the way they choose themselves.

Research on well-being provides crucial insights for economic and social policy as well as for business economics considering aspects such as recognition, autonomy, health, personal relationships and political institutions.

Keywords

Happiness, well-being, life satisfaction, business, management

I Modern Happiness Research

Research on happiness has recently become a hot topic in economics. For a long time, economists were convinced that it is not possible to measure utility. Therefore they developed a micro-economic theory avoiding measuring individual utilities. Instead they relied on "revealed preference", only. This theory was quite successful in many respects. In particular, it enabled extending economics to areas outside the narrow field of economics. Considerable insights were gained for instance with respect to politics, the natural environment, the family, or art and culture. Much of this successful extension is due to Becker (1965, also see Frey 2001). This development was coined "economic imperialism" because it introduced economic concepts into other disciplines and areas but the term also indicates that not everyone appreciated this extension.

Essentially since the turn of the century and millennium, it has become clear that there exists a useful proxy for the theoretical term of utility, namely happiness. Since then, there has been rapidly accumulating research on wellbeing. The term "well-being" is interchangeably used here with the term "happiness" because the latter is more vivid. This research has been inspired by social psychologists. In contrast to economic imperialism, economics has become an importer of concepts and methods from another discipline. Today, research on well-being is truly interdisciplinary. In contrast to previous research by philosophers the modern research on happiness is strongly based on empirical data collected by careful surveys and analyzed by extensive econometric estimates. The results gained are based on estimation equations simultaneously taking into account a large number of determinants relating to genetic, sociodemographic, economic, social, and political aspects.

Research on well-being has provided crucial insights for economic and social policy. One important advance has been that there now exits a valuable alternative to the concept of the commonly used Gross National Product as a welfare indicator. The digitalization of our world makes many activities free of charge; they are no longer done on markets on which a price must be paid. As a result GNP incompletely, or not at all, captures these activities, and therefore disregards increasingly more economic activities, let alone other aspects welfare producing individual welfare.

Happiness research so far has had a rather limited influence on *business economics* partly because the studies undertaken mostly analyzed issues more closely related to *general economics*. Another reason for the small influence is that business economics has for a long time theoretically and empirically analyzed job satisfaction (e.g. Spector 1997, Judge et al 2001, Cooper and Robertson 2013), so that it seemed to be unnecessary to seriously engage with the related concept of life satisfaction. However, job satisfaction and subjective well-being differ in two fundamental respects:

- (1) Job satisfaction is restricted to the work area (as the name suggests) while happiness economics is much broader. In addition to work it also considers the satisfaction with health, the family and leisure.

 Well-being research looks at *happiness as a whole*, and seeks to identify its determinants and its consequences.
- (2) Happiness or subjective well-being surveys do *not* ask respondents to react to the specific work conditions as done by job satisfaction research. Rather happiness research asks survey respondents to

indicate their *overall well-being in all aspects of life* independent of the determinants under consideration.

This contribution intends to show that business economics can substantially benefit from the insights gained in well-being research. Some of the knowledge acquired is in line with general public opinion, but other results are novel and surprising¹.

Section II of this paper shortly reviews some of the most important results with respect to the *determinants* of subjective well-being. The following section deals with the *consequences* of happiness most of which are directly relevant for issues in business. Section IV deals with the causality issues involved, and section V discusses whether management should *maximize happiness*. The final section concludes.

II Determinants of Happiness

The results reported in the following are based on variations of only one determinant at one time, i.e. all other determinants are kept constant (ceteris paribus). This approach is possible because the subjective life satisfaction

¹ See e.g. the extensive surveys in Frey and Stutzer 2002, 2005, 2012; Layard 2005; Dolan et al 2008; Frey 2008, Frey and Frey Marti 2010, Van Praag and Ferrer-i-Carbonell 2011, Frey and Stutzer 2013, Weimann et al. 2015, Helliwell et al 2017.

reported is correlated in a simultaneously estimated econometric equation with a large number of determinants.

Subjective life satisfaction is collected by extensive representative surveys in the population. The persons are asked to respond to the following question: "Taken overall, how satisfied are you with the life you lead?" The answers can be given ranging from 0 ("totally dissatisfied") to 10 ("totally satisfied"). This question explicitly asks people to respond in a subjective way, i.e. how they evaluate themselves how satisfied they are with their lives. In economically developed countries only very few people indicate a happiness level in the range 0 to 6. Most of the answers are around 7 and 8, and quite some people indicate that they are very happy (i.e. 9 or even 10). The answers correlate highly with objective indicators of happiness (e.g. Oswald and Hu 2010). Thus, people indicating high subjective life satisfaction smile more (the so-called Duchennesmile which cannot be faked), are more open and optimistic, have lesser problems with their partners and at the work place, and are less prone to commit suicide.

The econometric research on the determinants of well-being has reached challenging and important results. Many of them are in line with everyday observations. Among the best known results are:

• Individuals and households with higher *income* state to be happier – i.e. their subjective life satisfaction is higher – than those with lower income. There is a diminishing marginal effect of income on happiness. People rather quickly adapt to higher income, and they tend to compare themselves with people of higher income. This

- reduces their level of well-being because they consider themselves to be relatively less well-off.
- One of the most important factors for individual well-being are satisfactory *personal relationships*. Those persons having a good family life, friends and acquaintances are more satisfied with their lives than isolated persons.
- Good physical and psychic health is a most significant contributor to happiness. Happy persons live longer. This relationship between subjective well-being, physical health and life expectancy has been carefully analyzed in many studies; it is not simply a fairy tale. Research on happiness calls attention to the relationship of psychic and physical health and individual well-being (Layard 2015, Layard and Clark 2015).
- Happy persons enjoy longer life duration. They live almost 15 percent longer than persons considering themselves to be unhappy. In industrial countries this means that happy persons can expect to live around ten years longer than unhappy ones. Comparing happiness to other well-known influences on health (such as smoking or obesity) the influence of life satisfaction on health and longevity is pronounced.
- To live in a *democracy* makes happy; individuals value the possibility to politically participate in a meaningful and effective way. People are also more satisfied with their lives if as many political decisions as possible are taken on a *decentralized* level (Frey and Stutzer 2002).

These results are consistent with economic thinking. However, they do not fully correspond to what laypersons think and believe. For example, many think that people in poor developing nations are happier than those living in countries with higher average income, presumably because they assume that they are under less economic pressure and stress. The empirical research on happiness demonstrates in a great number of studies that this idea is mistaken. Income greatly contributes to happiness in all countries. Many people also believe that artists are unhappy because only then they are assumed to be productive and creative. Empirical happiness research also rejects this notion (Steiner 2017).

The econometrically based research on well-being has also produced results not in line with standard economic theory. These are four important examples:

• The *unemployed* are dramatically less happy than persons having a job.

This result holds even when in the happiness regression income in the form of unemployment compensation is kept constant. Thus the reason why unemployed persons are much less happy is not due to reduced income. In contrast, conventional economics considers work to be a burden or cost. People are assumed to work solely because of the pay they receive². Thus, to receive the same income but according to received economics, not having to work should raise well-being. Empirical research finds the opposite.

² See the critique in Osterloh and Frey 2000, Frey and Osterloh 2005, Rost and Osterloh 2009, Weibel et al. 2010, Larkin et al 2012, Rost 2017.

- The self-employed work more hours and on average have a lower income
 and higher risk than employees of a firm or other organization.
 Nevertheless, careful happiness studies reveal that the self-employed
 (ceteris paribus) are happier than those working as employees.
- Empirical studies on well-being suggest that persons giving money to
 other persons, or engaging in voluntary unpaid work, experience
 higher life satisfaction than those persons giving less or nothing to
 others.
- Commuting reduces subjective well-being to the persons involved. Often, commuters declare that they are not burdened by spending much time and inconveniences between where they live and work.
 Happiness surveys looking at overall well-being lead to the opposite conclusion (Stutzer and Frey 2008). Persons spending more than one hour declare themselves to be less satisfied with their lives than otherwise identical persons not commuting so long time. It turns out that this activity also negatively affects partners who do not commute.

III Consequences of Happiness

Life satisfaction has considerable effects on activities and conditions relevant for business (see e.g. De Neve and Xuereb 2013, Graham 2017). These are the most important impacts relevant in this context:

 Happy persons are more interested in the work they perform and are more engaged raising their *productivity*. In contrast, unhappy people do not like their work and tend to be careless which negatively affects their work output. These results have been found in careful laboratory experiments in order to well control other influences (Oswald et al. 2015). In the first experiment, some randomly chosen subjects' happiness levels were manipulated by showing them a cheerful picture, while those in the control group were not. Treated subjects have 12% greater productivity in a paid piece-rate task. They increase their output but not per-piece quality of work. To check this effect, major unhappiness shocks experienced in real life – bereavement and family illness – were analyzed. The results strongly confirm the results from the first experiment.

- Persons professing to have high life satisfaction are less affected by contagious deceases and are *healthier*. Good health contributes substantially to more effective work. Unhealthy workers impose substantial costs on firms even under the conditions of a well-developed social security system.
- Happy persons have higher intrinsic motivation to engage in work, appreciate more autonomy, and are more creative which again contributes to good work (Amabile 1996, Amabile and Kramer 2011, Yuan 2015).
- Person satisfied with the life they lead are less induced to engage in strikes, rebellions and outright civil war than are people who feel unhappy. Happiness tends to deter crime (McCarthy and Casey 2011). The absence of these disturbing political and social conditions helps business to do its task.

IV Causality Issues

Often it is difficult to establish in which direction the relationship between cause and effect works. It is, for instance not obvious whether married people get happier or happy people find it easier to get married. The same applies to work: Are employed persons happier or is it easier for happy persons to find a job because they are more active, innovative and open? The same factors can both be determinants, or consequences of subjective well-being.

To answer these questions it is helpful to consider a specific case, namely lottery winners. To win at a lottery can be considered an exogenous event independent of the participant. Therefore the lottery win can be taken to be a cause, while the change in subjective life satisfaction can be considered a consequence. Lottery winners indeed state in the following year that they are happier. This allows us to conclude that higher income and wealth do indeed raise happiness – but this is the case for a restricted time period only. Income produces subjective well-being, most importantly in poor countries below a certain material level of living.

V Should Firms Maximize Happiness?

Mostly in American firms, but also elsewhere, there is a trend to exploit happiness to attract and maintain more customers. In the United States there is a consultancy called Delivering Happiness with a Chief Happiness Officer (CHO), a

global happiness navigator, and a happiness alchemist (ECONOMIST 2016: 60). The idea is to induce employees to create "happiness hygiene". Employees are expected and strongly induced to do their work smiling and with other expressions of positive emotions. This tendency has become more prominent with the rising importance of the service sector in the economy. Accordingly, some firms make an effort to create happiness with their staff by offering them courses on mindfulness or yoga lessons³.

Such a business policy is totally inconsistent with the idea of happiness as used in the economic research discussed above. Subjective well-being must reflect the unbiased and non-coerced feelings of a representative selection of individuals. This is obviously not the case if employees are forced to look and behave in a happy way. If the employee behind the counter in a McDonalds shop appears to be happy when you order a hamburger few customers believe that such demeanour reflects a true feeling. Rather, most of them know that it is a marketing technique and nothing more.

But what about "true" happiness produced by business organizations?

Here the question arises what a "firm" means in this context. There are at least four possible ways to answer this question:

(1) The happiness of *managers*. While this may in many cases be actual policy (see, for example Pasquale 2015) it is normatively unacceptable that only the well-being of the executives is considered.

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³ Similarly to corporations, several governments – among them Germany, Britain, France and Australia – decided to maximize the happiness of their population. The Kingdom of Bhutan was the first to propagate the idea of Gross National Happiness; for a critique see Frey and Stutzer (2012).

- (2) The happiness of the *employees*. This would again be a complete misunderstanding of the function of a firm. A firm should certainly not exclusively care for employees' well-being though this may be true in reality in some cases, but it should provide goods and services demanded on the market.
- (3) The happiness of the *owners* of firms. Again, this is a wrong target because dividends and other streams of money compensate the owners of firms.
- (4) The happiness of the *stakeholders* including all the persons having relations with the firm, which in addition includes suppliers, customers, and other people affected in various ways by a firm, e.g. having to bear the burden of noise or environmental exhausts.

Many people, including some scholars, would argue that maximizing the happiness of stakeholders makes sense. However, more careful considerations suggest that this is unwarranted. There are four major reasons why stakeholder happiness maximization should not be undertaken:

- It remains totally open what weight should be given to the various groups. Should the happiness of barely affected suppliers have the same weight as that of full-time employees who spend a considerable part of their lives within the firm? Depending on what weights are chosen, any overall happiness measure for the firm as a whole can be constructed.
- The executives of a firm can at best guess, but do not really know,
 what makes their stakeholders happy. In any case, the respective

- persons know better, and in a free society should have the right to decide for themselves rather than be induced by the executives.
- When people are asked about their life satisfaction but know, or suspect, that it is used to measure "the happiness of a firm" they are likely to answer in a different way than is the case under present conditions where the respondents answer in a (more) truthful way because their answers are not given instrumentally.
- happiness find it easy to manipulate the corresponding happiness index. They can easily delete answers low in happiness, for instance by deleting the respective persons from the vaguely defined group of stakeholders. At the same time they can increase the number of high happiness answers for instance by correspondingly inducing and cajoling their employees, or by hiring "high happiness" persons for low part-time jobs and only for the time period in which the surveys are undertaken.

These considerations suggest that it is a mistaken idea to try to maximize the happiness of a firm. What a firm can, and should do, is to offer its shareholders the *possibilities to achieve happiness*. Most importantly, firms should create a work atmosphere conducing to employee satisfaction, which should support their own thinking and creativity and foster valuable social relationships. The corresponding behaviour can be supported by bequeathing awards (see Gallus and Frey 2016, Frey and Gallus 2017). In addition, work should not be so demanding and burdensome that employees are unable to enjoy

their leisure time. The income provided should be sufficient to lead a good life with respect to material standards. The length of commuting time should be reduced as far as possible, for example by offering more flexible work hours.

In addition, happiness research points to the general role of firms in society. They should offer goods and services of good quality and worth its cost and should abstain from deceiving consumers by providing mistaken information. This has recently done by the German car industry with respect to the environmental damage produced. Such a deception has direct consequences for people's well-being. Empirical research shows that inhabitants in Germany suffering a reduction in air quality through noxious emissions report a reduction in subjective life satisfaction (Lüchinger 2009).

When achieving these and other goals in the best possible way (which requires high managerial capabilities) the individuals having contacts with the firm can pursue their quest for happiness in the way best for themselves.

VI Conclusions

As pointed out, modern, empirically orientated happiness research provides valuable and new insights to both business and political economics.

Managers can benefit from the knowledge gained regarding the determinants and perhaps even more from the consequences of subjective well-being. They should, however, not engage in directly trying to raise the happiness of their employees, suppliers, customers and other stakeholders. Rather, they should lay the ground for the respective persons to be able to reach happiness in the way they choose themselves.

Modern interdisciplinary and strongly empirical orientated happiness directs attention to new aspects, which economic theory has little or not at all considered. Among them are social relationships and political institutions with respect to political participation rights and decentralization. In addition, values such as recognition, autonomy or the benefits derived from fair procedures (procedural utility) are to be taken into account. Economics is usefully generalized if such aspects and values are introduced as an integral part of a more encompassing theory.

Literature

Amabile, Teresa M., (1996). Creativity in Context. Boulder CO: Westview.

- Amabile, Teresa and Steven Kramer (2011). <u>The Progress Principle: Using Small</u>

 <u>Wins to Ignite Joy, Engagement, and Creativity at Work</u>. Cambridge, Mass.:.

 Harvard Business Review Press.
- Becker, Gary S. (1965). "A Theory of the Allocation of Time". *Economic Journal* 75: 299, 493–517.
- Cooper, Cary L. and Ivan T. Robertson (2013). Management and Happiness.

 Cheltenham UK and Northampton MA: Edward Elgar.
- De Neve, Jan-Emmanuel and Cody Xuereb (2013). "The Objectiv Benefits of Subjective Well-Being". In: John Helliwell and Jeffrey Sachs, eds.

 *Proceedings of the National Academies of Sciences 109 (49): 19953-19958.
- Dolan, Paul, Tessa Peasgood and Mathew White (2008). "Do We Really Know

 What Makes Us Happy? A Review of the Economic Literature on the Factors

 Associated with Subjective Well-Being". *Journal of Economic Psychology* 29

 (1): 94-122.

- ECONOMIST (2016). "Schumpeter: Against Happiness. Companies that try to turn happiness into a management tool are overstepping the mark".

 September 24th: 60.
- Frey, Bruno S. (2001). *Inspiring Economics: Human Motivation in Political Economy.* Cheltenham, UK and Northampton, Mass.: Elgar.
- Frey, Bruno S., (2008). *Happiness: A Revolution in Economics.* Cambridge MA: MIT Press.
- Frey, Bruno S. and Jana Gallus (2017). *Honour versus Money. The Economics of Awards.* Oxford: Oxford University Press.
- Frey, Bruno S. and Claudia Frey Marti (2010). *Glück. Die Sicht der Ökonomie.* 2. Auflage. Zürich and Chur: Rüegger.
- Frey, Bruno S. and Margit Osterloh (2005). "Yes, Managers should be paid like bureaucrats". *Journal of Management Inquiry* 14: 96-111.
- Frey, Bruno S. and Alois Stutzer (2002). *Happiness and Economics: How the Economy and Institutions Affect Well-Being*. Princeton and Oxford:

 Princeton University Press.
- Frey, Bruno S. and Alois Stutzer (2005). "Happiness Research: State and Prospects". *Review of Social Economy* 62 (2): 207-228.
- Frey, Bruno S. and Alois Stutzer (2012). "The Use of Happiness Research for Public Policy". *Social Choice and Welfare* 38 (4): 659-674.
- Frey, Bruno S. and Alois Stutzer, eds. (2013). *Recent Developments in the Economics of Happiness.* Cheltenham, UK and Northampton, Mass.: Elgar.
- Gallus, Jana and Bruno S. Frey (2016). "Awards: A Strategic Management Perspective," *Strategic Management Journal* 37: 1699-1714.

- Graham, Carol (2017). "Happiness and Economics: Insights for Policy from a new Science of Well-being". *Journal of Behavioral Economics for Policy* 1 (1): 69-72.
- Helliwell, John, Richard Layard and Jeffrey Sachs (2017). *Word Happiness Report*2017. Sustainable Development Solution Network, United Nations, New

 York.
- Judge, Timothy A., Carl J. Thoresen, Joyce E. Bono and Gregory K. Patton (2001).

 The job satisfaction–job performance relationship: A qualitative and quantitative review. *Psychological Bulletin* 127(3): 376-407.
- Larkin, Ian, Lamar Pierce and Francesco Gino (2012). "The Psychological Cost of Pay-for-Performance: Implication for the Strategic Compensation of Employees". *Strategic Management Journal* 33: 1194-1214.
- Layard, Richard (2005). *Happiness: Lessons from a New Science.* London: Penguin.
- Layard, Richard (2015). "A New Priority for Mental Health". Centre for Economic Performance, London School of Economics, Paper EA036.
- Layard, Richard and David M. Clark (2015). "Why more Psychological Therapy would cost nothing". *Frontiers in Psychology*, 6: ISSN 1664-1078.
- Lüchinger, Simon (2009). "Valuing Air Quality Using the Life Satisfaction Approach". *Economic Journal* 119: 482-515.
- McCarthy, Bill and Casey, Teresa (2011). "Get Happy! Positive Emotion,

 Depression and Juvenile Crime". Unpublished Conference Paper at the

 American Sociological Association Annual Meeting Las Vegas.
- Osterloh, Margit and Bruno S. Frey (2000). "Motivation, Knowledge Transfer and Organizational Form". *Organization Science* 11 (5): 538-550.

- Oswald, Andrew and Steven Wu (2010). "Objective confirmation of subjective measures of human well-being: evidence from the U.S.A.". *Science* 327 (5965): 576-579.
- Oswald, Andrew J., Eugenio Proto and Daniel Sgroi (2015). "Happiness and Productivity". *Journal of Labor Economics* 33 (4): 789-822.
- Pasquale, Frank (2015). *The Black Box Society*. Cambridge, Mass. and London: Harvard University Press.
- Rost, Katja and Margit Osterloh (2009). "Management Fashion. Pay-for-Performance for CEOs". *Schmalenbach Business Review* 61(4): 119-149.
- Rost, Katja (2017). "CEOs are Paid for Talent". In: Bruno S. Frey and David Iselin, eds. *Economic Ideas You Should Forget*. Cham: Springer: 109-110.
- Spector Paul E. (1997). *Job Satisfaction: Application, Assessment, Causes, and Consequences*. Thousand Oaks, CA: SAGE.
- Steiner, Lasse (2017). "Artists are Poor and Therefore Unhappy". In: Bruno S. Frey and David Iselin, eds. *Economic Ideas You Should Forget*. Cham: Springer: 135-138.
- Stutzer, Alois and Bruno S. Frey (2008). "Stress That Doesn't Pay: The Commuting Paradox". *Scandinavian Journal of Economics* 110: 339-366.
- Van Praag, Bernard and Ada Ferrer-i-Carbonell (2011). *Happiness Economics: A New Road to Measuring and Comparing Happiness.* Delft: Now Publishers.
- Weibel, Antoinette, Katja Rost and Margit Osterloh (2010). "Pay for Performance for the Public Sector Benefits and (Hidden) Costs". Journal of Public Administration Research and Theory, 20(2): 387-412.
- Weimann, Joachim, Andreas Knabe, and Ronnie Schöb (2015). *Measuring Happiness: The Economics of Well-Being*. Cambridge, MA: MIT Press.

Yuan, Leo (2015). "The Happier One Is, the More Creative One Becomes: An Investigation on Inspirational Positive Emotions from Both Subjective Well-Being and Satisfaction at Work". *Psychology* 6: 201-209.