



WORK IS ABOUT MORE THAN MONEY

*Toward a Full Accounting of the Individual, Social, and
Public Costs of Unemployment, and the Benefits of Work*

BRIAN DIJKEMA AND MORLEY GUNDERSON

OCTOBER 2019

CARDUS

AUTHORS

BRIAN DIJKEMA is the vice president of external affairs with Cardus. Prior to joining Cardus, Brian worked for almost a decade in labour relations in Canada. His primary research interests at Cardus are the institutional and policy relationships between government, civil society, and the market, with a particular view to exploring how a diverse civil society contributes to a vital and thriving market economy and stable government.

DR. MORLEY GUNDERSON holds the CIBC Chair in Youth Employment at the University of Toronto, where he is a professor at the Centre for Industrial Relations and Human Resources, and the Department of Economics.

ABOUT CARDUS

CARDUS IS a non-partisan, faith-based think tank and registered charity dedicated to promoting a flourishing society through independent research, robust public dialogue, and thought-provoking commentary.



[CARDUS.CA](https://www.cardus.ca)

CONTENTS

- INTRODUCTION 5
- METHODOLOGY 6
- HISTORICAL EVOLUTION AND CONTEMPORARY CONCEPTS OF WORK 7
- JOB LOSS, UNEMPLOYMENT, AND PHYSICAL AND MENTAL HEALTH 8
 - Losing a Job Can Kill 9
 - The Great Depression: Not Just Declining GDP 10
 - It's Not Just Workers Who Suffer; It's Children 10
- RETIREMENT AND PHYSICAL AND MENTAL HEALTH 12
- GENERAL STATEMENTS ON THE NON-MONETARY BENEFITS OF WORK 12
- LIFE SATISFACTION EVIDENCE ON THE NON-MONETARY BENEFITS OF WORK 15
- INDIRECT EVIDENCE ON THE NON-MONETARY BENEFITS OF WORK 16
- IMPLICATIONS OF THE NON-MONETARY BENEFITS OF WORK 20
- REFERENCES AND WORKS CITED 23

I like work; it fascinates me; I can sit and look at it for hours.

—MARK TWAIN

*I'm a great believer in luck, and I find
the harder I work the more I have of it.*

—THOMAS JEFFERSON

*It's true hard work never killed anybody,
but I figure, why take the chance?*

—RONALD REAGAN

*Working hard for something we don't care about is called stress.
Working hard for something we love is called passion.*

—SIMON SINE
motivational speaker and
organization consultant

The dictionary is the only place where success comes before work.

—MARK TWAIN

*Your work becomes a dance with light and the weather.
It takes you to a place within yourself.*

—ANNIE LEIBOVITZ
portrait photographer

*The reason a lot of people do not recognize opportunity is because
it usually goes around wearing overalls looking like hard work.*

—THOMAS EDISON

We don't live to work. . . . We work to live.

—ATTRIBUTED TO GENERATION Y

My vocation is my vacation. I love what I do.

—NICK CANNON
musician

WORK IS ABOUT MORE THAN MONEY

INTRODUCTION

We talk a lot about work in public policy. On any given week, Canadian politicians, industry associations, unions, and many others talk about labour-market participation, labour-market challenges, skills gaps, training the next generation of Canadian workers, gender equality in the workplace, income highs, income lows, income medians, regional labour markets, and on and on. We discuss and debate the empirical evidence. We argue vociferously about the best ways to maximize outcomes. News broadcasters dedicate significant chunks of airtime to “jobs reports,” and the House of Commons and legislatures across the country are filled with speeches from parties across the spectrum about “hard-working Canadians” and “the middle class.” And it’s not all just talk: Employment and Social Development has more employees in it than any other federal department save National Defence and Canada Revenue Agency. If collecting taxes and national defence are the two more important activities of any national government, it’s clear that jobs and work are next.

And yet, in a very real sense there is a large hole in our public discussions about work. Our public debate on work and employment focuses on its economic outcomes such as wages, contributions to GDP, and individual and household incomes. **But work is about more than money.** Debate often *disproportionately* focuses on wages, but wages are only one part of what occurs in employment; and paid employment is only one type of work. Work has other benefits and challenges that cannot be measured by paycheques alone. This paper will explore the link between work and various non-monetary outcomes, including the following:

INDIVIDUAL SOCIALIZATION ELEMENTS: Work is a community that include basic friendships, a community of practice (i.e., carpenters as tradespersons are a community in their own right), a place where conflict is brought and resolved, where individuals are often habituated in democratic practices and learn to manage disputes and to navigate power structures and authority. But it is also a place where one is “known,” which means that work also contains . . .

PSYCHOLOGICAL ELEMENTS: Work is a significant shaper of one’s identity. “What do you do?” is among the first questions asked when one meets another person, and many people identify themselves with work. While this can have obvious challenges and can be unhealthy, work is a personal marker of who you are. “I’m a lawyer” or “I’m a mother/father” or “I’m a land surveyor” or “I’m a nurse,” and so on. And it’s not just identity. Work also contributes to satisfaction, “usefulness,” and other healthy

psychological characteristics. The link between unemployment and depression is one example of what can go wrong when work is missing. This leads to . . .

HEALTH ELEMENTS: There has been a focus on health and safety as an issue *within* workplaces, but is there a case to be made that work itself—with its routines, and in combination with psychological elements—is good for the mind and body? How? What are the effects of work on an individual’s health?

COMMUNITY ELEMENTS: What are the links between employment and other communities? Is there an effect of employment/unemployment on families (e.g., links to divorce, children), or on neighbourhoods and communities (e.g., do employed people volunteer more, give more to charity)? What about particular populations that are underrepresented in our current employment context? Does work have unique benefits for such populations?

The underlying motivation behind this paper is to collate scholarly work that will provide policy-makers with a single source that can inform major policy debates. The aim for this paper is not to privilege any particular policy response but to raise awareness within our political debates about the multi-faceted character of work and its benefits. While there is a broad consensus in Canada about the importance of work, and while many of our policies are aimed at encouraging work (Canada Workers Benefit, for instance), support for these policies often finds its basis in economic terms alone. In a world where much debate occurs about the “future of work,” and where many are concerned about its scarcity, a review of the data that underscores the importance of work as a broader human endeavour can assist in shaping new proposals for a variety of government programs. This in turn can make space for civil-society organizations, including but not limited to business firms, to contribute to the development of a “work-first” culture.

METHODOLOGY

In our survey, wherever possible, the literature that is cited will refer to studies that often review other studies that arrive at the same conclusion. As well, an emphasis will be placed on the more sophisticated studies that establish a cause-and-effect or *causal* link between work and the various outcomes, as opposed to simply an association or correlation. The causal link is important for dealing with the underlying causes as opposed to the symptoms, and for establishing where policy interventions should occur. It is also important for predicting future changes when the underlying causes may change.

Many people, and many policies, focus on the importance of work and the encouraging of it. But what, exactly, is it that work does for us? Why do we seem to care so much about work, and why is it that the primary goal of our policy debate focuses on its financial aspects? While not discounting the financial effects of work (indeed, financial benefits are linked to work’s other benefits), this paper will lay out the case for the non-financial effects of work.

We will begin with non-financial outcomes from work that are related to individuals (their physical and mental health). We will then move to outcomes related to families and finally to communities. We will conclude by making the case for greater emphasis on the non-monetary aspects of work and a need for rethinking our policy framework around work.

HISTORICAL EVOLUTION AND CONTEMPORARY CONCEPTS OF WORK

Prior to outlining the literature on the non-monetary aspects of work, a brief introduction will be provided on the various perspectives associated with the historical evolution of the concepts of work. Excellent treatments of that varied evolution are given, for example, in Budd (2011), Cuilla (2000), and Muirhead (2004). That evolution included various notions of work: work as punishment for Adam's sin and his banishment to toil in hard labour; work to be done only by slaves as necessary for the productive leisure and fulfillment of others (Aristotle and Plato); work as a moral imperative (Protestant work ethic of Luther and Calvin); wage labour as part of the evolution of capitalism with the negative consequences of alienating people from themselves (Marx); and modern concepts involving work done for the purpose of earning income to finance consumption and leisure activities as well as to establish status and illustrate success.

Most of these concepts associate work with disutility and view it as being done for some purpose other than its intrinsic value. This is also the case with respect to conventional treatments of work in modern labour economics textbooks (e.g., Benjamin, Gunderson, Lemieux, and Riddell 2017). In that framework, utility is obtained from income and leisure, and individuals maximize their utility subject to a budget constraint that reflects any non-labour income they have as well as their wage rate from working (giving up leisure). Working is assumed to involve disutility since it involves giving up leisure, which is valued. Work is done to earn a wage rate that provides the income to purchase goods and services that are also valued.



WORK AS PUNISHMENT



WORK AS NECESSARY FOR LEISURE



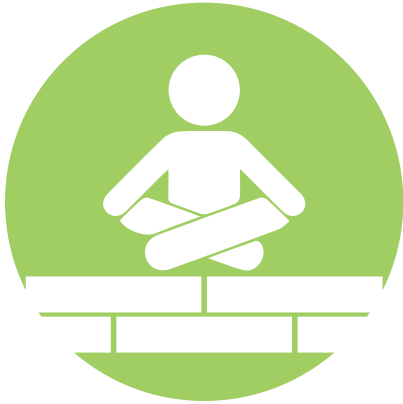
WORK AS A MORAL IMPERATIVE



WAGE LABOUR AS ALIENATION



WORK AS LIFESTYLE



THE WAY ECONOMISTS SEE WORK

Utility is obtained from income and leisure, and individuals maximize their utility subject to a budget constraint that reflects any non-labour income they have as well as their wage rate from working (giving up leisure).

It is the case that different individuals can have different preferences for income versus leisure, which implies differences in disutility associated with working. As well, individuals may value non-monetary aspects of work (e.g., flexible work schedules, training opportunities) and therefore are prepared to give up wages in return for positive aspects of work; or they may require higher compensating wages for negative aspects such as risk and overtime work. The extensive literature on compensating wages for workplace attributes (termed hedonic wage estimates) is reviewed, for example, in Benjamin et al. (2017, 217–31). It is also the case that compensating wages paid for work that involves extreme disutility can enable individuals to purchase goods and services that can make them better off if such work is voluntarily chosen.

Nevertheless, the basic assumption is that work has disutility and is done to earn a wage to provide the income to purchase goods and services. In many circumstances, this assumption is realistic and provides important insights into behaviour. For example, income-maintenance programs like employment insurance, workers' compensation, and disability payments can reduce the incentive to work both because they provide the means to afford not to work, and they generally "claw back" some of the payment if the individual does work. Evidence of this for a wide range of income-maintenance programs is provided in Benjamin et al. (2017, 92–99). As well, even for persons for whom work

has little or no disutility, there are times when their behaviour will change depending on the financial rewards. While this basic assumption that work has disutility is realistic in many circumstances, it misses important aspects of work that are not associated with a paycheck. These various positive, non-monetary aspects of work (and negative aspects of not working) are analyzed next.

JOB LOSS, UNEMPLOYMENT, AND PHYSICAL AND MENTAL HEALTH

The importance of work for our physical health is perhaps best illustrated by the literature on the health aspects of losing a job and of retiring involuntarily. A difficulty in establishing a causal relationship (as opposed to an association or correlation) between health and job loss or retirement is the potential for reverse causality; that is, people in ill health may lose their job if their performance declines, or they may retire early. The more sophisticated studies in this area use

econometric techniques to establish the causality between job loss or involuntary retirement and health.

For example, job losses from mass layoffs and plant closings in declining industries like steel, pulp and paper, and auto manufacturing do not have the issue of reverse causality whereby the poor health of their workers caused the job losses. Job losses from mass layoffs and plant closings are exogenous events caused by other factors such as technological change, trade liberalizations, and global competition. The literature on the effects of job loss as well as unemployment clearly establishes a negative effect on the physical and mental health as well as the mortality of individuals (e.g., Hamilton et al. 1997; Morissette et al. 2007 for Canada; with reviews of the earlier literature for Canada in Gunderson and Riddell 2000; Black et al. 2017; Burgard et al. 2017; Case and Deaton 2017; Dooley and Catalano 1988; Fitzpatrick and Moore 2018; and Sullivan and von Wachter 2009 for the US; Eliason and Storrie 2006; 2009a; 2009b for Sweden; Bloemen et al. 2017 for the Netherlands; Behncke 2012 for England; Browning and Heinesen 2012 for Denmark; Mathers and Schofield 1998 for Australia; and Urbanos-Garrido and Lopez-Valcarcel 2015 for Spain).

The literature on the effects of job loss as well as unemployment clearly establishes a **negative effect on the physical and mental health** as well as the mortality of individuals.

LOSING A JOB CAN KILL

The magnitudes of the effect are quite large. For example, Sullivan and von Wachter (2009) found that mortality increased by 50 percent in the first year after job loss and continued to 10–15 percent even twenty years after. Eliason and Storrie (2009a, 277) indicate that “the overall mortality risk among men increased by 44 percent during the first four years following job loss, while there was no impact on either female overall mortality or in the longer run. For both sexes, however, there was an about twofold short-run increase in suicides and alcohol-related mortality.” Browning and Heinesen (2012) found that mortality increased by 80 percent in the first year after job loss and continued to 10 percent even twenty years after in Denmark. Bloemen et al. (2017) found that mortality increased by 34 percent over the first five years after job loss in the Netherlands, due mainly to cancers and cardiovascular diseases. Beale and Nethercott (1985) indicate that the health effects occur for the families and not just the individuals directly affected by the job loss, and that they occur in anticipation of the eventual job loss.

McKee-Ryan et al. (2005) systematically reviewed 104 empirical studies involving 437 estimates of the effect of unemployment on worker well-being. They found that unemployed individuals had lower psychological and physical well-being than did their employed counterparts. The relationship was mitigated, but not eliminated, for individuals who had more personal, social, and financial coping resources.



THE GREAT DEPRESSION: NOT JUST DECLINING GDP

Ward and King (2017, 63–64) review the literature on unemployment and psychological well-being and conclude, “It is well-established that people who are employed have higher psychological well-being than people who are unemployed. . . . Compared to the unemployed, people who are employed have lower odds of depression and anxiety, as well as higher life satisfaction and happiness.” While any lower income while unemployed plays a part, those negative effects prevail even when controlling for such decreases in income (Clark and Oswald 2002).

IT’S NOT JUST WORKERS WHO SUFFER; IT’S CHILDREN

In an earlier extensive review of the literature, Dew et al. (1991) documented the negative mental and physical effects of job loss and unemployment not only on the job losers but also on their spouses as well as intergenerationally on their children. Brown and De Cao (2018, 1) provide causal estimates “that a one percentage point increase in the unemployment rate leads to a 20 percent increase in [child] neglect.” However, that negative effect is somewhat mitigated by the availability of state-provided unemployment insurance and health insurance.

Importantly, several studies (Daly and Delany 2013; Schröder 2013; and Vobemer et al. 2018) document that the long-term health effects from involuntary job loss for youths are substantial. The scarring effects can last for thirty years or more.

Substantial negative intergenerational effects can prevail for the children of parents who lose their jobs. Such effects include children dropping out of school or being expelled or repeating grades (Johnson et al. 2012; Kali 2005; 2008; 2011; Stevens and Schaller 2011). Such negative intergenerational effects lead to lower lifetime income of the children of parents who lose their job (Page et al. 2009).

Based on panel data that surveyed individuals four times over a forty-five-year period, Brand and Burgard (2008) document how job losses can have significant negative effects on broader community involvement and participating in social activities

including church groups, community groups, charitable activities, and socializing with friends, as social trust is diminished. Additional studies that outline the negative effect of job loss and job insecurity on social participation include Freeman (1997), Putnam (2000), Rotólo and Wilson (2003), Wilensky (1961), and Wilson (2000). The reverse is also true whereby persons with stable jobs engage in more social participation including volunteering (Wilensky 1961; Wilson and Musick 1997).

Job loss and unemployment have numerous other negative consequences. These include the following:

- Self-harm and suicide (Blakely, Collings, and Atkinson 2003; Browning and Heinesen 2012; Case and Deaton 2017; Kposowa 2001; Keefe et al. 2002; Lewis and Sloggett 1998)
- Domestic abuse and child abuse and neglect with their intergenerational negative consequences (Alonso-Borrego and Perea 2017; Brown and De Cao 2018; Dew et al. 1991)
- Family conflict and divorce (Charles and Stephens 2004; Hansen 2005)
- Traffic accidents (Browning and Heinesen 2012; Eliason and Storrie 2009b)
- Anti-social behaviour and criminal activity (Dell et al. 2019; Dix-Carneiro 2018; Gould et al. 2002 and references cited therein) with subsequent incarceration having substantial long-term effects on the health not only of those who are incarcerated but also on their families and children (literature reviewed in Massoglia and Pridemore 2015)
- Increases in unhealthy lifestyle behaviours leading to negative health outcomes such as cardiovascular diseases and cancer:
- Smoking (Ayyagari 2016; Black et al. 2015; Falba et al. 2005; Jin, Shah, and Svoboda 1995; Lee et al. 1991)
- Alcohol and substance abuse recently associated with the opioid crises (Case and Deaton 2017; Catalano et al. 1993; Dooley and Prause 1998; Jin, Shah, and Svoboda 1995; Kasl et al. 1975).
- Sedentary lifestyles (Barnett et al. 2014; Evenson et al. 2002)

Substantial negative intergenerational effects can prevail for the children of parents who lose their jobs. Such effects include children dropping out of school or being expelled or repeating grades. Such negative intergenerational effects lead to **lower lifetime income of the children of parents who lose their job.**

RETIREMENT AND PHYSICAL AND MENTAL HEALTH

Similar results as those for job loss are found in the literature on the effects of retirement, and especially involuntary retirement, on physical and mental health. As with the job-loss literature, establishing the direction of causality is difficult because physical or mental-health problems may foster retirement. Again, the more sophisticated studies deal with that issue in various ways. Rohwedder and Willis (2010), for example, argue that retirement is fostered more by the incentives to retire as embedded in private and public pensions as well as tax and disability policies. Based on data from the United States, England, and eleven European countries, they document that retiring early leads to large declines in cognitive ability. Similar results are found in Bonsang et al. (2013), Dave et al. (2008), and Mazzonna and Peracchi (2012). In effect, physical retirement fosters mental retirement, substantiating the “use it or lose it” hypothesis. The cognitive decline associated with retirement occurs because “workers engage in more mental exercise than retirees because work environments provide more cognitively challenging and stimulating environments than do nonwork environments” (Rohwedder and Willis (2010, 127). In essence, work is more than money—it fosters mental development.

Kuhn et al. (2018) used a policy that encouraged individuals in Austria to retire earlier than individuals who were not subject to the policy change to control for the possibility that persons in ill health may select into early retirement. They found that the policy change induced eligible workers to exit the labour force significantly earlier than those not subject to the policy change, and one year of earlier retirement for men caused a 6.8 percent increase in the risk of premature death and 0.2 years reduction in the age at death. They found no significant effect for women.

Other studies have documented that early retirement leads to changes in daily routines and unhealthy lifestyles that foster ill health. Based on Dutch data, for example, Henkens et al. (2008, 647) find that “workers who retired involuntarily had elevated risk of smoking more and reduced risk of both smoking and drinking less, which may suggest that involuntary retirees use alcohol and tobacco as a means to cope with the cognitive stress produced by an unplanned exit from paid work.”

GENERAL STATEMENTS ON THE NON-MONETARY BENEFITS OF WORK

In addition to the literature on the specific non-monetary aspects of work cited above, numerous scholars who have researched the topic have made general statements about the non-monetary benefits of work. Illustrative quotations from their studies are given below.

WORK IS TOO IMPORTANT for individuals and society to be dismissed as a curse, treated as just another commodity or economic resource, or viewed solely as a source of income. (Budd 2011, 186)

ALTHOUGH ECONOMIC OUTPUT has risen steeply over the past decades, there has been no rise in life satisfaction during this period, and there has been a substantial increase in depression and distrust. We argue that economic indicators were extremely important in the early stages of economic development, when the fulfillment of basic needs was the main issue. As societies grow wealthy, however, differences in well-being are less frequently due to income, and are more frequently due to factors such as social relationships and enjoyment at work. (Diener and Seligman 2004, 1)

PAID WORK ACTIVITIES can provide not only enjoyable activities, but also a structure for the day, social contact, a means of achieving respect, and a source of engagement, challenge, and meaning. (Diener and Seligman 2004, 1)

UNEMPLOYMENT IMPOSES an additional burden on the individual, a burden that might be referred to as the non-pecuniary cost of unemployment. Those costs arise primarily since employment is not only a source of income but also a provider of social relationships, identity in society and individual self-esteem. (Winkelmann and Winkelmann 1998, 1)

THE IMPACT OF UNEMPLOYMENT on mental health takes many forms, including depression, anxiety, low self-esteem and strained personal relations. . . . Social psychologists have drawn the connection from joblessness to negative emotional consequences to lower productivity in several interrelated ways: as a consequence of lower self-esteem; as a consequence of feeling that life is not under one's control; and as a loss of what might be called by-products of participating in a work environment. (Darity and Goldsmith 1996, 122)

JAHODA (1988) IDENTIFIES five latent benefits people derive from work: employment imposes a time structure on the working day; employment implies regularly shared experiences and contacts with people outside the nuclear family; employment links individuals to goals and purposes that transcend their own; employment defines aspects of personal status and identity; and finally, employment enforces activity. She believes that unemployment is psychologically destructive because the individual is deprived of these latent functions. (Darity and Goldsmith 1996, 124)

Work is too important for individuals and society to be dismissed as a curse, treated as just another commodity or economic resource, or viewed solely as a source of income.



WHETHER ONE LIKES OR HATES *one's job, it structures time for the day, the week, the years; it broadens the social horizon beyond family and friends; it enforces participation in collective purposes; it defines one's social status; it demands reality-oriented activities.* (Jahoda 1988, 17)

IN ALL CASES, *the evidence suggests that groups of the unemployed have higher mean levels of experienced strain and negative feelings, and lower mean levels of happiness, present life satisfaction, experience of pleasure and positive feelings than comparable employed people.* (Fryer and Payne 1986, 247, in an earlier review of over one hundred studies)

EMPIRICAL EVIDENCE ALSO INDICATES *that the risk of job loss and unemployment and the associated stresses in turn increase the risk of health problems, child abuse, spouse abuse, accidents and criminal activity—all of which negatively impact on the individuals, their families, their communities and the cost of social services.* (Gunderson and Riddell 2000, 26, citing the earlier Canadian evidence linking the risk of job loss and unemployment to these broader social risks)

WHEN WE THINK ABOUT LABOR, *we usually think about motivation and payment as the same thing, but the reality is that we should probably add all kinds of things to it: meaning, creation, challenges, ownership, identity, pride, etc.* (Dan Ariely, TED Talk, June 9, 2015; Ariely 2016 emphasizes the importance of trust, meaningfulness, acknowledgement of others, and effort)

On the psychological effects, Brand (2015, 365) extensively reviews the literature and concludes,

A LARGE LITERATURE ON MENTAL HEALTH *has focused on the impact of stressful life events, such as unemployment and job loss. Job loss disrupts more than just income flow; it disrupts individuals' status, time structure, demonstration of competence and skill, and structure of relations. It carries societal stigma, creating a sense of anxiety, insecurity, and shame. Research suggests that displaced workers report higher levels of depressive symptoms, somatization, anxiety, and the loss of psychosocial assets. . . . Leading explanations for why job loss and unemployment negatively impact social-psychological well-being include lowered self-esteem, self-acceptance, self-confidence, morale, life satisfaction, sense of purpose, and sense of control; heightened apathy, idleness, isolation, and the breakdown of social support; and a loss of the positive derivatives of participating in a work environment, such as skill use, time structure, economic security, interpersonal socialization, and valued societal position.*

On the physical health impact, Brand (2015, 367) extensively reviews the literature and concludes,

JOB LOSS HAS BEEN LINKED *to both short- and long-term declines in physical health, including worse self-reported health, physical disability, cardiovascular disease, greater number of reported medical conditions, increase in hospitalization, higher use of medical services, higher use of disability benefits, increase in self-destructive behaviors and suicide, and mortality.*

Indeed it would not be surprising if, were work a medicine, it would be widely prescribed by doctors.

BASED ON THE *American Time Use Survey (ATUS) and the UK Annual Population Survey (APS) . . . I find that jobs that combine professional autonomy with having a direct social impact within the context of a trusting relationship are found to be the most meaningful and worthwhile, controlling for selection into these jobs.* (Bryce 2018, 1)



This combination of social impact and autonomy, along with trusting relationships, suggests that not all work is equal, and that policies aimed at promoting work that ignores these factors may be limited in their ability to achieve positive social outcomes.

LIFE SATISFACTION EVIDENCE ON THE NON-MONETARY BENEFITS OF WORK

The previous examples highlighted the benefits of work by illustrating the negative consequences of not working and positive aspects of working as illustrated through job losses, unemployment, and retirement. There is also evidence of the non-monetary benefits of work based largely on scales where individuals record their well-being or satisfaction with life or “happiness” and how that is affected by being unemployed. While such happiness scales can be questioned, they can provide some insights especially when corroborated by other evidence.

Clark and Oswald (2002) utilize such a happiness scale applied to British data. They find that the decrease in happiness from moving from employment to unemployment is approximately twice as large as the decrease in becoming separated or being widowed, even when controlling for the income loss associated with not working. They conclude (p. 1141), “The vast majority of the well-being impact of unemployment thus does not stem from the loss of wages (see also Clark and Oswald 1994 and Winkelmann and Winkelmann 1998). The main cost of job loss is psychological.”

Winkelmann and Winkelmann (1998) use a life-satisfaction scale based on German panel data. They find that “unemployment has a significant and substantial negative impact on satisfaction. The non-pecuniary costs of unemployment by far exceed the pecuniary costs associated with loss of income while unemployed” (p. 13). They also point out that unemployment may have longer-run negative effects by changing preferences away from work as well as searching for work and lowering productivity.

Work in the market
is associated with
**significant intrinsic
rewards.**



Van Praag and Ferreri-Carbonell (2002) use a life-satisfaction scale for persons with the same household income in Germany and document a very high monetary value of work. They find, “For the average worker the switch to the non-worker’s situation would cause a cost of 1.466 times the income of the worker in order to remain equally happy. Thus, the equivalent family income is higher than the income of the worker when working. Concretely, the worker needs 46% more of the income she had when working. This 46% of the actual income corresponds to the non-monetary costs of loosing [*sic*] one’s job” (p. 13).

Frey and Stutzer (2010) review much of the recent literature based on happiness scales. They highlight the negative effect of unemployment on happiness and well-being, and that this goes beyond the income loss associated with being unemployed.

INDIRECT EVIDENCE ON THE NON-MONETARY BENEFITS OF WORK

The previous discussion highlighted the direct evidence of the non-monetary benefits of work. There is also indirect evidence as illustrated by people’s actions and behaviours related to work.

For example, lottery winners typically continue to work, often at jobs for which the income hardly matters given their new wealth (Arvey, Harpaz, and Liao 2004; Kaplan 1985). Presumably the intrinsic value of work with its networks and other non-monetary aspects dominates the leisure they can now afford.

As discussed previously, evidence indicates that income-maintenance programs can reduce the incentive to work by providing the means to afford not to work and by clawing back payments for those who work (Benjamin et al. 2017, 92–99). However, individuals who are eligible for welfare often bypass welfare receipt and work at jobs that provide them with income that is no greater than what they would receive if they were on welfare (Juster 1990, 171, 172). This could reflect that they were ill informed about the possibility of receiving welfare, or they wanted to avoid any stigma associated with welfare, or that they are investing in labour-market

experience. But it is also consistent with the notion of non-monetary benefits associated with work. It is also suggestive that policy approaches related to work and welfare programs should not take a binary, “either-or” approach.

Juster (1990) also indicates that female labour-force participation has risen substantially over time. This could be explained by their rising wages, but he points out that their labour-force participation has grown when their wages have been rising slowly or not at all. He indicates that “a simpler explanation is that work in the market is associated with significant intrinsic rewards, and quite possibly that these rewards have been shifting upward over time as working wives have become a more socially acceptable phenomenon” (p. 171).

He also points out that technology, and especially the internet, has facilitated working from home. Long commute times to work have also made working from home more attractive. And while working from home has increased, most individuals continue to work in an external work environment, likely reflecting the socialization and interactive activities that occur at the workplace. These examples, and survey data on people’s stated preferences, lead him to conclude, “The intrinsic rewards from work are, on average, at least as high as the intrinsic rewards from leisure. If that result is taken at face value, it suggests that economists need to do a major rethinking of the elements that go into individual utility functions” (Juster 1990, 169).

There is also evidence that men tend not to take paid parental leaves even when they are available (Findlay and Kohen 2012). This may occur because women tend to be more responsible for the care of children, and men may worry about any negative signal to employers of a lack of commitment to their work. But it is also consistent with work providing substantial non-monetary benefits.

Strong preferences for work and the fact that many work activities are preferred over many non-work activities are further documented in Dow and Juster (1985) and Juster (1985). Pride in one’s work can also be a strong motivator, independent of money (Katzenback 2003).

Individuals volunteer their time for no pay, highlighting that individuals will do things for reasons other than money. The motivation may be altruism, the feeling of a “warm glow,” or religious beliefs—but it is not for money (Gomez and Gunderson 2003; Wooley 2003). In fact, if the volunteering act is monetized and volunteers are paid, they will often engage in less volunteering (Bénabou and Tirole 2006; Frey 1997; Frey and Jegen 2001). In essence, individuals are not motivated by money. In fact, money has a negative impact on their willingness to volunteer; money may “crowd out” the volunteer activity.

The notion that extrinsic rewards like money can crowd out intrinsic motivation has broader applications to management practices as well. Excessive reliance on such extrinsic monetary rewards on the part of managers can crowd out or discourage intrinsic motivations on the part of employees (Budd 2011, 183; Fehr and Falk 2002; and Deci et al. 1999 for an extensive review of the literature). Fehr and Schmidt (2006, 681) indicate that in situations where it is difficult for employers to monitor all aspects of the performance of employees, “It is well known [Holmström and Milgrom 1991; Baker

Workers value purpose and meaningfulness at work, and it demonstrates that **workers are willing to give up pecuniary benefits for nonpecuniary benefits**. Workforce-development policies at both corporate and state levels would be wise to consider such non-pecuniary benefits to work.

1992] that in this situation explicit performance incentives may be harmful because they induce the employees to concentrate only on the rewarded tasks and to neglect the non-rewarded tasks.”

Employees also care about fairness at work, not only for themselves but also for the treatment of their fellow employees (Fehr and Schmidt 2006; Rothenberg 2006). In many cases, they are prepared to give up money to ensure such fairness. In the industrial-relations area, for example, the principle of due process is a key ingredient of such fairness.

Cassar and Meier (2018, 220) indicate that “people contribute time and effort to open-source initiatives, often anonymously and without financial returns, because they believe in the free diffusion of knowledge.” They point to Wikipedia, the world’s sixth-most-popular website.

It is also the case that individuals who work for non-profit organizations with a social purpose are often paid less (Handy and Katz 1998; Jones 2015; Leete 2001; Preston 1988). Again, their motivation for working is related to the broader social purpose, and they are willing to give up money to facilitate those ends. Light (2002) surveyed US non-profit workers and found that 61 percent placed the chance to make a difference higher than pay.

The same applies to profit-making corporations that have a social-responsibility agenda. Employees in such corporations are often willing to accept lower pay to work in such companies (Burbano 2016; Nyborg and Zhang 2015). Their work involves a broader social purpose, and they are willing to give up money to facilitate that purpose. Burbanno (2016, 1010), for example, found that “workers submitted 44% lower wage bids for the same job after learning about the employer’s social responsibility. This paper provides causal empirical evidence of a revealed preference for social responsibility in the workplace, and of a greater preference among the highest performers. More broadly, it provides evidence that workers value purpose and meaningfulness at work, and it demonstrates that workers are willing to give up pecuniary benefits for nonpecuniary benefits.” More generally, individuals work harder if they believe in the mission of the organization (Carpenter and Gong 2016). Again, such evidence is suggestive that workforce-development policies at both corporate and state levels would be wise to consider such non-pecuniary benefits to work.

People can also work for the social and peer recognition associated with awards that have no monetary value (Chan et al. 2014; Kosfeld and Neckermann 2011).

Building on earlier work by Bellah et al. (1985), Wrzesniewski et al. (1997) outline three ways in which individuals regard their work: as jobs, careers, or callings. People who have jobs only work for the money that enables them to acquire the resources needed to enjoy their time away from the job. The job has no intrinsic value. People who have careers work for the money such advancement brings, but they also work for the social standing, power, and self-esteem and satisfaction brought by such advancement. People with callings find their work to be inseparable from their life. Work is an end in itself, done for personal fulfillment and not money. It often has a religious connotation associated with doing morally and socially important work (Davidson and Caddell 1994). Wrzesniewski et al. (1997) provide survey evidence indicating that about equal numbers regard their work as falling into each of the three categories, highlighting that for about a third of workers, money is the main motivator, and for about half of workers, money is one of several (that is, money is a motivator, but not the main one). Interestingly, those who see their work as a calling have the highest life and work satisfaction, based on a subsample with similar income, education, and occupation. Rosso et al. (2010, 99) review the literature on work as a calling.

Related to work as a calling, Rosso et al. (2010) reviewed the literature in *Research in Organizational Behavior* on the spiritual aspect of work. They concluded,

Research demonstrates that spiritual employees tend to interpret work activities in relation to something outside of and larger than themselves, related to a higher purpose or meaning (Lips-Wiersma, 2002; Sullivan, 2006; Wuthnow, 1994, 1995). In this sense, spirituality as a source of meaningfulness shares similarities with other sources, such as interpersonal relationships and the cultural context, where meaningfulness results from connecting to entities beyond the self. . . . Research shows that spiritual employees perceive their work behaviors in spiritual terms of caring, service, and transcendence (Curlin, Dugdale, Lantos, and Chin, 2007; Grant et al. 2004; Scott, 2002; Wuthnow, 2004). Therefore, when

Employees also care about fairness at work, not only for themselves but **also for the treatment of their fellow employees**. In many cases, they are prepared to give up money to ensure such fairness.



employees perceive work in a spiritual light, their work is likely to take on a deeper sense of meaningfulness and purpose for them. (pp. 106–7)

Based on interviews, Sullivan (2006) highlights that spirituality and faith help give work a sense of purpose and meaning for higher-income persons, as well as the strength to survive and continue working for low-income persons.

Joshi et al. (2009) extensively review the literature on outcomes associated with spirituality and religion. With respect to work, they conclude, “Higher levels of religiosity may provide a pathway out of multi-problem behavioral patterns that can accompany limited resources by promoting better coping mechanisms for economic instability and stress as well as better ways to self-regulate behavior and adhere to positive cultural norms and values” (p. ES2).

In addition to these extensive aspects associated with the non-monetary aspects of work, there is evidence of negative effects from extensively valuing only the monetary aspects for materialistic purposes. Promisio et al. (2010) cite numerous studies on this relationship, and they provide further causal evidence of such negative effects on work-family conflict of valuing only the monetary aspects for materialistic purposes.

The conclusions drawn from the papers noted above are suggestive of potential social gains that could be achieved if policies related to employment and economic stability were made in consultation with, and perhaps in conjunction with, faith-based groups working on employment and economic development in local communities.

Individuals often want to continue working for its non-monetary aspects even though they can afford to work less.

IMPLICATIONS OF THE NON-MONETARY BENEFITS OF WORK

Clearly, work is about more than money. Recognizing this has important practical and policy implications, as well as shedding light on trends that otherwise may be hard to explain given the conventional emphasis on the monetary aspects of work.

Recognizing the importance of the non-monetary aspects of work would facilitate recruitment and retention for employers, especially in cases of two-earner families where work-family balance is increasingly important, and they may be prepared to give up income to facilitate such balance. Any costs to employers of providing work-life balance may be offset by the lower pay that employees may be willing to accept in return for such balance.

Monetary incentives can be important to encourage work effort, allocate labour to its most efficient use, and encourage human capital formation; however, excessive reliance on such extrinsic rewards can crowd out or discourage intrinsic motivation in part because individuals do not want to leave the impression that they are doing things only for money. This is most obvious in the case of volunteering where paying volunteers can reduce their incentive to volunteer, but it is also relevant for managerial practices that rely extensively on monetary rewards.

The cost of job loss and unemployment typically emphasizes the lost wages. But this is only a component, and perhaps a small component, of the cost. As documented, a host of non-monetary costs are involved for individuals, their families and communities, and society at large. And these can have a legacy of intergenerational scarring effects. Social costs also occur in the form of crime, incarceration, and health-care costs. These broader non-monetary costs should be considered by policy-makers dealing with initiatives to prevent unemployment and job loss.

This can be particularly important for young people. As indicated, negative experiences in being unemployed or in having a bad job can have a legacy of long-run scarring effects. They may turn their back on a labour market that they believe has turned its back on them.

Recognizing the importance of the non-monetary aspects of work can also be important for understanding why hours of work have not substantially declined in recent years in spite of our increase in wealth that should have enabled us to “buy more leisure” and work less. Kaplan and Schulhofer-Wohl (2018, 240) use US survey evidence on feelings about work to document that “work has become less painful and less tiring in the postwar period.” This suggests that individuals often want to continue working for its non-monetary aspects even though they can afford to work less. They also speculate that technological change associated with robotics and artificial intelligence may not dramatically displace labour if people want to continue working for non-monetary reasons.

Their results also highlight that “women have shifted to occupations that produce more happiness and meaningfulness and less sadness, while experiencing no change in stress,” while men



Researchers also speculate that technological change associated with robotics and artificial intelligence **may not dramatically displace labour if people want to continue working for non-monetary reasons.**

“have shifted toward occupations that produce more stress, less happiness, and less meaningfulness” (Kaplan and Schulhofer-Wohl 2018, 240). This may help explain some of the rise in the labour-force participation of women and the decline for men. In essence, the non-monetary returns to working have increased for women and declined for men.

The importance of the non-monetary aspects of work may also help explain the fact that the reductions in work in response to income-maintenance programs like the universal basic income have generally been modest and often statistically insignificant (see Hum and Simpson 1993 for Canadian evidence, as well as references to the US evidence). Potential adverse effects on the incentive to work tend to be the concern of economists because the increased income for recipients enables them to afford not to work, and if they work, their transfer payments are reduced because of high clawback rates. Yet such large reductions in work tend not to occur even though the program provides the means to facilitate their not working and they have a reduced incentive to work because their transfer payments are clawed back if their earned income increases. A possible explanation for their continuing to work is that individuals work for more than money. This possibility of minimal adverse work-incentive effects from such universal basic income programs suggests that such programs merit more policy attention, especially since their longer-run non-economic effects such as on health are substantial (Forget 2011).

While it is legitimate to be concerned over the adjustment consequences of technological change, robotics, and artificial intelligence, it is also the case that the “end of work” has not come to fruition. To the extent that individuals value work for intrinsic reasons, they have a strong incentive to continue working.

To the extent that the non-monetary aspects of work are substantial and have increased over time as physical labour has declined, this suggests that our emphasis on gross national product measures may be misleading. Such an emphasis misses the changes in well-being associated with changes in the non-monetary aspects of work. This has been emphasized in the “happiness” literature that stresses the disconnect between well-being and wealth.

Evaluations of training and other active adjustment programs tend to emphasize the effects on earnings and employment. This is important, but it is not the whole story. The substantial non-monetary aspects of work suggest that more emphasis should be placed on the employment dimension, even if earnings do not increase. Cost-benefit analysis of such programs should consider such non-monetary aspects even if they cannot be quantified. In some cases, they may even be quantified given the previous discussion of estimates of the amount of money people would be willing to give up to avoid unemployment (Winkelmann and Winkelmann 1998; Van Praag and Ferreri-Carbonell 2002).

Overall, it is clear that we should rethink many of our conventional views and policy prescriptions that emphasize the monetary aspects of work. More emphasis needs to be placed on the non-monetary aspects of work. Money matters, but work is about more than money. ^

REFERENCES AND WORKS CITED

- Alonso-Borrego, Cesar and Raquel Carrasco Perea, 2007. "Employment and the Risk of Domestic Violence: Does the Breadwinner's Gender Matter?" *Applied Economics* 49, no. 50:5074–91.
- Ariely, Dan. 2016. *Payoff: The Hidden Logic That Shapes Our Motivations*. New York: TED Books.
- Arvey, R.D., I. Harpaz, and H. Liao. 2004. "Work Centrality and Post-award Work Behavior of Lottery Winners." *Journal of Psychology* 138:404–20.
- Ayyagari, Padmaja. 2016. "The Impact of Retirement on Smoking Behavior." *Eastern Economic Journal* 42:270–87.
- Baker, G. 1992. "Incentive Contracts and Performance Measurement." *Journal of Political Economy* 100:598–614.
- Barnett, Inka, Esther van Sluijs, David Oglivie, and Nicholas Wareman. 2014. "Changes in Household, Transport and Recreational Physical Activity and Television Viewing Time Across the Transition to Retirement." *Journal of Epidemiology and Community Health* 68, no. 8:747–53.
- Beale, N., and S. Nethercott. 1985. "Job-Loss and Family Morbidity: A Study of a Factory Closure." *Journal of the Royal College of General Practitioners* 35, no. 280:510–14.
- Behncke, Stefanie. 2012. "Does Retirement Trigger Ill Health?" *Health Economics* 21:282–300.
- Bellah, R.N., R. Madsen, W.M. Sullivan, A. Swidler, and S. Tipton. 1985. *Habits of the Heart*. New York: Harper & Row.
- Bénabou, Roland, and Jean Tirole. 2006. "Incentives and Prosocial Behavior." *American Economic Review* 96, no. 5:1652–78.
- Black, Sandra E., Paul J. Devereux, and Kjell G. Salvanes. 2015. "Losing Heart? The Effect of Job Displacement on Health." *Industrial and Labor Relations Review* 68, no. 4:833–61.
- Blakely, T.A., S.C. Collings, and J. Atkinson. 2003. "Unemployment and Suicide. Evidence for a Causal Association?" *Journal of Epidemiology and Community Health* 57, no. 8:594–600.
- Bloemen, Hans, Stefan Hochguertel, and Jochem Zweerink. 2017. "The Causal Effect of Retirement on Mortality: Evidence from Targeted Incentives to Retire Early." *Health Economics* 26, no. 12: e204–e218.
- Bonsang, E., S. Adam, and S. Perelman. 2012. "Does Retirement Affect Cognitive Functioning?" *Journal of Health Economics* 31, no. 3:490–501.

- Brand, J. 2015. "The Far-Reaching Impact of Job Loss and Unemployment." *Annual Review of Sociology* 41, no. 1:359–75.
- Brand J., and S. Burgard. 2008. "Job Displacement and Social Participation Over the Life Course: Findings for a Cohort of Joiners." *Social Forces* 87, no. 1:211–42.
- Brown, Dan, and Elisabetta De Cao. 2018. "The Impact of Unemployment on Child Maltreatment in the United States." University of Essex Institute for Economic Research.
- Browning, Martin, and Eskil Heinesen. 2012. "Effect of Job Loss due to Plant Closure on Mortality and Hospitalization." *Journal of Health Economics* 31, no. 4:599–616.
- Bryce, Andrew. 2018. "Finding Meaning Through Work: Eudaimonic Well-Being and Job Type in the US and UK." Working Paper 2018-004, The University of Sheffield, Department of Economics.
- Budd, John. 2011. *The Thought of Work*. Ithaca, NY: ILR Press.
- Burbano, Vanessa. 2016. "Social Responsibility Messages and Worker Wage Requirements: Field Experimental Evidence from Online Labor Marketplaces." *Organization Science* 27, no. 4:1010–28.
- Burgard, S., J.E. Brand, J.S. House. 2007. "Toward a Better Estimation of the Effect of Job Loss on Health." *Journal of Health and Social Behavior* 48:369–84.
- Carpenter, Jeffrey, and Erick Gong. 2016. "Motivating Agents: How Much Does the Mission Matter?" *Journal of Labor Economics* 34, no. 1:211–36.
- Case, Anne, and Angus Deaton. 2017. "Mortality and Morbidity in the 21st Century." *Brookings Papers on Economic Activity* (spring): 397–443.
- Cassar, L., and S. Meier. 2018. "Nonmonetary Incentives and the Implications of Work as a Source of Meaning." *Journal of Economic Perspectives* 32, no. 3:215–38.
- Catalano, R., D. Dooley, G. Wilson, and R. Hough. 1993. "Job Loss and Alcohol Abuse: A Test Using Data from the Epidemiologic Catchment Area Project." *Journal of Health and Social Behavior* 34, no. 2:15–25.
- Chan, Ho Fai, Bruno S. Frey, Jana Gallus, and Benno Torgler. 2014. "Academic Honors and Performance." *Labour Economics* 31:188–204.
- Charles, K.C., and M. Stephens Jr. 2004. "Job Displacement, Disability and Divorce." *Journal of Labor Economics* 22, no. 2:489–522.

- Clark, A.E., and A.J. Oswald. 2002. "A Simple Statistical Method for Measuring How Life Events Affect Happiness." *International Journal of Epidemiology* 31, no. 6:1139–44.
- Cuilla, J. 2002. *The Working Life: The Promise and Betrayal of Modern Work*. New York: Three Rivers Press.
- Curlin, F.A., L.S. Dugdale, J.D. Lantos, and M.H. Chin. 2007. "Do Religious Physicians Disproportionately Care for the Underserved?" *Analysis of Family Medicine* 5, no. 4:353–60.
- Daly, M., and L. Delaney. 2013. "The Scarring Effect of Unemployment Throughout Adulthood on Psychological Distress at Age 50: Estimates Controlling for Early Adulthood Distress and Childhood Psychological Factors." *Social Science and Medicine* 80:19–23.
- Darity, W., Jr., and A.H. Goldsmith. 1996. "Social Psychology, Unemployment, and Macro-economics." *Journal of Economic Perspectives* 10:121–40.
- Dave, Dhaval, Inas Rashad, and Jasmina Spasojevic. 2008. "The Effects of Retirement on Physical and Mental Health Outcomes." *Southern Economic Journal* 75, no. 2:497–523.
- Davidson, J.C., and D.P. Caddell. 1994. "Religion and the Meaning of Work." *Journal for the Scientific Study of Religion* 33:135–47.
- Dell, Melissa, Benjamin Feigenberg, and Kensuke Teshima. 2019. "The Violent Consequences of Trade-Induced Worker Displacement in Mexico." *AER: Insights*. <https://doi.org/10.1257/>.
- Dew, M.A., L. Penkower, and E.J. Bromet. 1991. "Effects of Unemployment on Mental Health in the Contemporary Family." *Behavior Modification* 15, no. 4:501–44.
- Diener, Ed, and Martin Seligman. 2004. "Beyond Money: Toward an Economy of Well-Being." *Psychological Science in the Public Interest* 5, no. 1:1–31.
- Dix-Carneiro, Rafael, Rodrigo R. Soares, and Gabriel Ulyssea. 2018. "Economic Shocks and Crime: Evidence from the Brazilian Trade Liberalization." *American Economic Journal: Applied Economics* 10, no. 4:158–95.
- Dooley, D., and J. Prause. 1998. "Underemployment and Alcohol Misuse in the National Longitudinal Survey of Youth." *Journal of Studies on Alcohol* 59, no. 6:669–80.
- Dooley, D., and R. Catalano. 1988. "Psychological Effects of Unemployment." *Journal of Social Issues* 44, no. 4:1–12.

- Dow, G.K., and F.T. Juster. 1985. "Goods, Time and Well-Being: The Joint Dependence Problem." In *Time, Goods and Well-Being*, edited by F.T. Juster and F.P. Stafford, 397–413. Ann Arbor: Institute for Social Research.
- Eliason, Marcus, and Donald Storrie. 2006. "Lasting or Latent Scars? Swedish Evidence on the Long-Term Effects of Job Displacement." *Journal of Labor Economics* 24, no. 4:831–56.
- . 2009a. "Does Job Loss Shorten Life?" *Journal of Human Resources* 44, no. 2:277–302.
- . 2009b. "Job Loss Is Bad for Your Health: Swedish Evidence on Cause-Specific Hospitalization Following Involuntary Job Loss." *Social Science and Medicine* 68, no. 8:1396–1406.
- Evenson, Kelly, Wayne Rosamond, Jianwen Cai, Anna Diez-Roux, and Fredrick Brancat. 2002. "Influence of Retirement on Leisure-Time Physical Activity: The Atherosclerosis Risk in Communities Study." *American Journal of Epidemiology* 155, no. 8:692–99.
- Falba, Tracy, Hsun Mei Teng, Jody Sindelar, and William Gallo. 2005. "The Effect of Involuntary Job Loss on Smoking Intensity and Relapse." *Addiction* 100, no. 9:1330–39.
- Fehr, E., and K. Schmidt. 2006. "The Economics of Fairness, Reciprocity and Altruism—Experimental Evidence and New Theories." In *Handbook of the Economics of Giving, Altruism and Reciprocity*, edited by S.-C. Lohm and J. Ythier, 1:616–84. Oxford: Elsevier.
- Findlay, Leanne, and Dafna Kohen. 2012. "Leave Practices of Parents After the Birth or Adoption of Young Children." *Canadian Social Trends*. Statistics Canada No. 11-008-X.
- Fitzpatrick, Maria, and Timothy Moore. 2018. "The Mortality Effects of Retirement: Evidence from Social Security Retirement at Age 62." *Journal of Public Economics* 157:121–37.
- Forget, Evelyn. 2011. "The Town with No Poverty: The Health Effects of a Canadian Guaranteed Annual Income Field Experiment." *Canadian Public Policy* 37, no. 3:284–305.
- Freeman, Richard. 1997. "Working for Nothing: The Supply of Volunteer Labor." *Journal of Labor Economics* 15, no. 1:S140–S166.
- Frey, Bruno S. 1997. *Not Just for the Money: An Economic Theory of Intrinsic Motivation*. Cheltenham, UK: Edward Elgar.
- Frey, Bruno S., and Alois Stutzer. 2010. *Happiness and Economics: How the Economy and Institutions Affect Human Well-Being*. Princeton: Princeton University Press.
- Frey, Bruno S., and Reto Jegen. 2001. "Motivation Crowding Theory." *Journal of Economic Surveys* 15, no. 5:589–611.

- Fryer, D.M., and R.L. Payne. 1986. "Being Unemployed: A Review of the Literature on the Psychological Experience of Unemployment." In *International Review of Industrial and Organizational Psychology*, edited by C. L. Cooper and I. Robertson, 235–78. London: Wiley.
- Gomez, Rafael, and Morley Gunderson. 2003. "Volunteer Activity and the Demands of Work and Family." *Relations Industrielles/Industrial Relations* 58:573–89.
- Gould, E., B. Weinberg, and D. Mustard. 2002. "Crime Rates and Local Labor Market Opportunities in the United States: 1979–1997." *Review of Economics and Statistics* 84, no. 1:45–61.
- Grant, D., K. O’Neil, and L. Stephens. 2004. "Spirituality in the Workplace: New Empirical Directions in the Study of the Sacred." *Sociology of Religion* 65, no. 3:265–83.
- Gunderson, Morley, and Craig Riddell. 2002. "The Changing Nature of Work: Implications for Public Policy," In *Adapting Public Policy to a Labour Market in Transition*, edited by W.C. Riddell and F. St-Hilaire, 1–38. Montreal: Institute for Public Policy.
- Hamilton, V.H., P. Merrigan, and É. Dufresne. 1997. "Down and Out: Estimating the Relationship Between Mental Health and Unemployment." *Health Economics* 6, no. 4:397–406.
- Handy, Femida, and Eliakim Katz. 1998. "The Wage Differential Between Nonprofit Institutions and Corporations: Getting More by Paying Less?" *Journal of Comparative Economics* 26, no. 2:246–61.
- Hansen, H.-T. 2005. "Unemployment and Marital Dissolution: A Panel Data Study of Norway." *European Sociological Review* 21, no. 2:1350–48.
- Henkens, K., H. Van Solinge, and W. Gallo. 2008. "Effects of Retirement Voluntariness on Changes in Smoking, Drinking and Physical Activity Among Dutch Older Workers." *European Journal of Public Health* 18, no. 6:644–49.
- Holmström, B., and P. Milgrom. 1991. "Multi-task Principal-Agent Analyses." *Journal of Law, Economics, and Organization* 7:24–52.
- Hum, Derek, and Wayne Simpson. 1993. "Economic Response to a Guaranteed Annual Income: Experience from Canada and the United States." *Journal of Labor Economics* 11, no. 1:263–94.
- Jahoda, M. 1988. "Economic Recessions and Mental Health: Some Conceptual Issues." *Journal of Social Issues* 44, no. 4:13–23.
- Jin, R.L., C.P. Shah, and T.J. Svoboda. 1995. "The Impact of Unemployment on Health: A Review of the Evidence." *Canadian Medical Association Journal* 153:529–40.

- Johnson R.C, A. Kalil, and R. Dunifon. 2012. "Employment Patterns of Less-Skilled Workers: Links to Children's Behavior and Academic Progress." *Demography* 49:747–72.
- Joshi, Pamela, Erin Hardy, and Stephanie Hawkins. 2009. *Role of Religiosity in the Lives of the Low-Income Population: A Comprehensive Review of the Evidence*. Final Report Prepared for Department of Health and Human Services Office of the Assistant Secretary for Planning and Evaluation, US Department of Health and Human Services.
- Jones, Daniel B. 2015. "The Supply and Demand of Motivated Labor: When Should We Expect to See Nonprofit Wage Gaps?" *Labour Economics* 32:1–14.
- Juster, F.T. 1985. "Preferences for Work and Leisure." In *Time, Goods, and Well-Being*, edited by F.T. Juster and F.P. Stafford, 333–51. Ann Arbor: Institute for Social Research.
- . 1990. "Rethinking Utility Theory." *Journal of Behavioral Economics* 19, no. 2:155–79.
- Kalil A., and K. Ziol-Guest. 2005. "Single Mothers' Employment Dynamics and Adolescent Well-Being." *Child Development* 76, no. 10:196–211.
- . 2008. "Parental Employment Circumstances and Children's Academic Progress." *Social Science Research* 37:500–515.
- Kalil A., and P. Wightman. 2011. "Parental Job Loss and Children's Educational Attainment in Black and White Middle-Class Families." *Social Science Quarterly* 92, no. 1:57–78.
- Kaplan, G., and S. Schulhofer-Wohl. 2018. "The Changing (Dis-)utility of Work." *Journal of Economic Perspectives* 32:239–58.
- Kaplan, R. 1985. "Lottery Winners and Work Commitment." *Journal of the Institute for Socioeconomic Studies* 10, no. 2:82–94.
- Kasl, S.V., S. Gore, and S. Cobb. 1975. "The Experience of Losing a Job: Reported Changes in Health, Symptoms, and Illness Behavior." *Psychosomatic Medicine* 37, no. 2:106–22.
- Katzenbach, Jon. 2003. *Why Pride Matters More than Money: The Power of the World's Greatest Motivational Force*. New York: Crown Business.
- Keefe, V., P. Reid, C. Ormsby, et al. 2002. "Serious Health Events Following Involuntary Job Loss in New Zealand Meat Processing Workers." *International Journal of Epidemiology* 31, no. 6:1155–61.
- Kosfeld, Michael, and Susanne Neckermann. 2011. "Getting More Work for Nothing? Symbolic Awards and Worker Performance." *American Economic Journal: Microeconomics* 3, no. 3:86–99.

- Kposowa, A.J. 2001. "Unemployment and Suicide: A Cohort Analysis of Social Factors Predicting Suicide in the US National Longitudinal Mortality Study." *Psychological Medicine* 31, no. 1:127–38.
- Kuhn, Andreas, Jean-Philippe Wuellrich, and Josef Zweimüller. 2018. "Fatal Attraction? Access to Early Retirement and Mortality." NBER Working Paper 25124.
- Lee, A.J., I. Crombie, W.C.S. Smith, and H.D. Tunstall-Pedoe. 1991. "Cigarette Smoking and Employment Status." *Social Science Medicine* 33, no. 11:1309–12.
- Leete, Laura. 2001. "Whither the Nonprofit Wage Differential? Estimates from the 1990 Census." *Journal of Labor Economics* 19, no. 1:136–70.
- Lewis G., and A. Sloggett. 1998. "Suicide, Deprivation, and Unemployment: Record Linkage Study." *British Medical Journal* 317:1283–86.
- Light, Paul C. 2002. "The State of the Nonprofit Workforce." *Nonprofit Quarterly* (fall): 6–16.
- Lips-Wiersma, M. 2002. "The Influence of Spiritual 'Meaning-Making' on Career Behavior." *Journal of Management Development* 21, nos. 7/8:497–519.
- Massoglia, Michael, and William Pridemore. 2015. "Incarceration and Health." *Annual Review of Sociology* 41:291–310.
- Mathers, C.D., and D.J. Schofield. 1998. "Health Consequences of Unemployment: The Evidence." *Medical Journal of Australia* 168, no. 4:178–82.
- Mazzonna, F., and F. Peracchi. 2012. "Ageing, Cognitive Abilities and Retirement." *European Economic Review* 56, no. 4:691–710.
- McKee-Ryan, Frances, Zhaoli Song, Connie Wanberg, and Angelo Kinicki. 2005. "Psychological and Physical Well-Being During Unemployment: A Meta-analytic Study." *Journal of Applied Psychology* 90, no. 1:53–76.
- Morissette, R., X. Zhang, and M. Frenette. 2007. "Earnings Losses of Displaced Workers: Canadian Evidence from a Large Administrative Database on Firm Closures and Mass Layoffs." Statistics Canada. Analytical Studies Branch Research Paper Series, No. 291.
- Muirhead, Russel. 2004. *Just Work*. Cambridge, MA: Harvard University Press.
- Nyborg, Karine, and Tao Zhang. 2013. "Is Corporate Social Responsibility Associated with Lower Wages?" *Environmental and Resource Economics* 55, no. 1:107–17.

- Preston, Anne E. 1988. "The Effects of Property Rights on Labor Costs of Nonprofit Firms: An Application to the Day Care Industry." *Journal of Industrial Economics* 36, no. 3:337–50.
- Promisio, Mark, John Deckop, Robert Giacalone, and Carole Jurkiewicz. 2010. "Valuing Money More than People': The Effects of Materialism on Work-Family Conflict." *Journal of Occupational and Organizational Psychology* 83:935–53.
- Putnam, Robert. 2000. *Bowling Alone: The Collapse and Revival of American Community*. New York: Simon & Schuster.
- Rohwedder, S., and R.J. Willis. 2010. "Mental Retirement." *Journal of Economic Perspectives* 24, no. 1:119–38.
- Rosso, B.D., K. Dekas, and A. Wrzesniewski. 2010. "On the Meaning of Work: A Theoretical Integration and Review." *Research in Organizational Behavior* 30:91–127.
- Rothenberg, Julio. 2006. "Altruism, Reciprocity and Co-operation in the Workplace." In *The Economics of Giving, Altruism and Reciprocity*, edited by S.-C. Kolm and J. Ythier, 1371–1407. Oxford: Elsevier.
- Rotólo, Thomas, and John Wilson. 2003. "Work Histories and Voluntary Association Memberships." *Sociological Forum* 18, no. 4:603–19.
- Schröder, Mathias. 2013. "Jobless Now, Sick Later? Investigating the Long-Term Consequences of Involuntary Job Loss on Health." *Advances in Life Course Research* 18, no. 1:5–15.
- Scott, T.L. 2002. "Choices, Constraints, and Calling: Conservative Protestant Women and the Meaning of Work in the U.S." *International Journal of Sociology and Social Policy* 22:1–38.
- Stevens, A.H., and J. Schaller. 2011. "Short-Run Effects of Parental Job Loss on Children's Academic Achievement." *Economic Education Review* 30, no. 2:289–99.
- Sullivan, D., and T. von Wachter. 2009. "Job Displacement and Mortality: An Analysis Using Administrative Data." *Quarterly Journal of Economics* 124, no. 3:1265–1306.
- Sullivan, S.C. 2006. "The Work-Faith Connection for Low-Income Mothers: A Research Note." *Sociology of Religion* 67, no. 1: 99–108.
- Urbanos-Garrido, R.M., and B.G. Lopez-Valcarcel. 2015. "The Influence of the Economic Crisis on the Association Between Unemployment and Health: An Empirical Analysis for Spain." *European Journal of Health and Economics* 16, no. 2:175–84.

- Van Praag, B., and A. Ferreri-Carbonell. 2002. "Life Satisfaction Differences Between Workers and Non-workers: The Value of Participation Per Se." Tinbergen Institute Discussion Paper, No. 02-018/3.
- Vobemer, Jonas, Michael Gebel, Olena Nizalova, and Olga Nikolaieva. 2018. "The Effect of an Early Career Job Loss on Later Health in Europe." *Advances in Life Course Research* 35:60–76.
- Ward, Sarah, and Laura King. 2017. "Work and the Good Life: How Work Contributes to Meaning in Life." *Research in Organization Behaviour* 37:59–82.
- Wilensky, Harold. 1961. "Orderly Careers and Social Participation: The Impact of Work History on Social Integration in the Middle Class." *American Sociologies* 26, no. 4:521–39.
- Wilson, John. 2000. "Volunteering." *Annual Review of Sociology* 26:215–40.
- Wilson, John, and Marc Musick. 1997. "Work and Volunteering: The Long Arm of the Job." *Social Forces* 76, no. 1:251–72.
- Winkelmann, L., and R. Winkelmann. 1998. "Why Are the Unemployed So Unhappy? Evidence from Panel Data." *Economica* 65:1–15.
- Woolley, F. 2003. "Social Cohesion and Voluntary Activity: Making Connections." In *Economic Implications of Social Cohesion*, edited by L. Osberg, 150–82. Toronto: University of Toronto Press.
- Wrzesniewski, Amy, Clark McCauley, Paul Rozin, and Barry Schwartz. 1997. "Jobs, Careers, and Callings: People's Relations to Their Work." *Journal of Research in Personality* 31, no. 1:21–33.
- Wuthnow, R. 1994. *Learning to Care*. New York: Oxford University Press.
- . 1995. *Sharing the Journey: Support Groups and America's New Quest for Community*. New York: Free Press.
- . 2004. *Saving America? Faith-Based Services and the Future of Civil Society*. Princeton: Princeton University Press.

CARDUS WORK AND ECONOMICS is committed to the renewal of an economic architecture that supports a wide array of individuals, communities, and the common good.



cardus.ca/research/workandeconomics

