



the work foundation

The Business Case for Employees Health and Wellbeing

A report prepared for Investors in People UK

Stephen Bevan

April 2010



Contents

1. Introduction	3
2. Methods	6
3. The business case for employee health and wellbeing	7
4. Conclusions	23
Appendix 1. Bibliography	25
Contact details	35

List of Figures

Figure 1: Business benefits of a healthy workforce	10
Figure 2: Percentage of UK workers who report monotony at work	18
Figure 3: Influences on employee health and wellbeing	23

1. Introduction

As we emerge tentatively from recession, the UK's labour productivity still lags some way behind many other leading European Countries such as France, Germany, the Nordic countries and others by up to 20 per cent. The conventional economic prescription for this problem comprises a range of measures which include investment in technology and innovation, labour market deregulation, and up-skilling the workforce. While each of these – to a greater or lesser extent – have a part to play, none of them takes account of a fundamental problem which represents an increasingly serious barrier to growing prosperity – that much of the British workforce is not healthy enough to drive the improvements in productivity which the UK needs. Indeed, with 2.6 million people of working age claiming Employment and Support Allowance (ESA), formerly Incapacity Benefit (IB), with over 25 per cent of the workforce with a work-limiting illness or injury and with the burden of chronic disease among the working age population set to increase over the next 30 years (Vaughan-Jones and Barham, 2009), the UK is already facing the economic and social consequences of a 'wellness' crisis.

Until now many of the measures taken by employers to improve workplace health have been categorised as 'perks' or employee benefits for those workers who often, in clinical terms, may need them least. But now employee health is becoming a hard, economic 'factor of production' and the government, a growing number of businesses and even some economists are arguing that it is time to take workplace health and wellbeing as seriously as we take research and development, investment in technology and customer relationship management.

Many of the health problems of the UK workforce can be attributable to worsening public health with poor diets, growing obesity, smoking and more sedentary lifestyles all playing their part. Some can also be explained by growing levels of workplace 'stress', personal debt and family breakdown and their links to depressive illness. Of course, part of the solution here rests with government. It must take the lead in the public health arena, encouraging and educating citizens to make healthier choices in their lives. For individuals, it means taking more proactive personal responsibility for their lifestyle choices, health and wellbeing. However, employers and employees have a role to play too. For organisations this means going beyond the bare bones of the legal 'duty of care' for which they are already accountable under health and safety legislation.

While there is growing and compelling evidence that work is good for health in the vast majority of cases, we still lack the capacity at workplace level to translate what we know from epidemiological and other research into simple, consistent and business-friendly actions to improve job quality, work organisation, health promotion and other drivers of positive health at

work. As is so often the case, our analysis of the problem is impeccable but our track-record of delivery and execution at firm-level is, at best, patchy.

1.1 It should be acknowledged that a growing number of employers are adopting measures aimed at promoting health and wellbeing among their employees. These, often larger, organisations have recognised that the workplace can be used to promote or reinforce healthier working practices and lifestyle choices. They also know that they can influence several aspects of their employee's physical and psychological wellbeing in ways which can improve their productivity, commitment and attendance. This includes providing good quality jobs which allow employees more control, autonomy and involvement in the way their work is done (Coats and Lekhi, 2008). However, these enlightened employers are still in the minority. Many others see employee health and wellbeing as the private concern (and responsibility) of workers, or narrowly confined to the need to comply with health and safety legislation. This amounts to a '*do no harm*' mentality which is common among many organisations today.

The role of employers

Yet there are many who argue that employers cannot justify this somewhat short-sighted position for much longer. Dame Carol Black, in her report to the government on the health of the working age population¹ concluded that, among other things, UK employers are bearing a significant proportion of the wider economic costs of ill-health, chronic disease and incapacity. If anything, Dame Carol argues, the situation is likely to get significantly worse over the next two or three decades as the workforce ages and as the burden of chronic disease increases (Vaughan-Jones and Barham, 2009).

Overall, then, the evidence suggests that the '*do no harm*' philosophy is likely to be unsustainable and that more employers – especially small and medium-sized employers (SMEs), where most people in the UK work – will need to re-think their role in promoting wellbeing as both a business imperative and as part of their wider social responsibility.

1.2 One of the organisations which has been in the vanguard of attempts to engage UK employers in the issues of employee health and wellbeing has been Investors in People (IiP UK). Using its already successful model of a set of standards and a network of highly experienced assessors, IiP UK has been developing, piloting and evaluating approaches aimed at engaging employers – large and small, public and private – in more thoughtful consideration of employee health and wellbeing as a business performance issue. IiP has also focused considerable attention on the need to implement and embed small but practical changes in policy and procedures.

Investors in People (IiP UK)

¹ *Working for a Healthier Tomorrow*, London:TSO, March 2008

Along with the Health and Safety Executive (HSE) the Advisory, Conciliation and Arbitration Service (ACAS) and other organisations, liP UK has found that many employers – especially, but not exclusively, SMEs – can be difficult to convince. It is not that ‘business case’ arguments which support more investment in employee wellbeing are difficult to evidence. Rather, these arguments are often insufficiently powerful, accessible or articulate in the way they have been presented. Yet, as the evidence builds of an ever more serious crisis looming in coming years, the need to reach more employers with both analysis and support grows more compelling.

1.3
The Work
Foundation
research

liP UK is persuaded that its work to support employers focus on health and wellbeing is effective and worthy of further investment. Indeed, it sees a strong case for embedding aspects of its health and wellbeing framework (which it has been piloting extensively) into the next version of its Standard. In order to marshal some of the wider business case evidence and arguments in an accessible way, liP UK commissioned The Work Foundation – an independent, not-for-profit research, policy and advisory organisation – to carry out a small study.

The study has had three main objectives:

- To report on the business case for additional focus on health and wellbeing to be included into the next version of The Standard;
- To examine if and how health and wellbeing has a positive impact on productivity in the workplace drawing on research gathered by liP UK, as well as external sources;
- To report if the findings provide a rationale for including more health and wellbeing factors in the next version of The Standard rather than confining it to the more stretching profile framework.

This report represents the results of the work and is divided into three main sections:

Section 2. Methods – a description of the approach taken and the array of evidence examined.

Section 3. Business case for employee health and wellbeing – a presentation of the main areas where employers will suffer direct and indirect business consequences if they ignore employee health and wellbeing, and where they stand to benefit if they take it seriously.

Section 4. Conclusions – a short distillation of the core arguments and the specific implications of the study findings for Investors in People (liP UK).

2. Methods

This short section describes the approaches taken to gather and interrogate ‘business case’ evidence for the study. Evidence included existing research conducted for liP, other external publications and interviews with experts.

2.1
Review of
existing liP
research
evidence

liP UK has itself commissioned several significant studies examining different aspects of employee health and wellbeing. The Work Foundation conducted a structured review of these studies which entailed:

- Devising a framework of criteria against which to assess the evidence presented by each;
- Each of the liP UK-funded studies was then independently reviewed by three members of The Work Foundation team against the framework criteria, using a simple scoring system;
- Results of these independent reviews were then compared to arrive at an overall assessment of the strength of the evidence in each. This has allowed us to extract the most powerful business arguments for health and wellbeing and the supporting evidence.

2.2
Review of
external
publications

In addition to reviewing the liP UK-funded studies The Work Foundation also conducted an analysis of a significant body of academic and other research which specifically probes the question of the business benefits of a healthy workforce. The key papers we have collected and examined are listed in a bibliography in Appendix 1. However, to ensure this report is easily accessible to readers we have only specifically referred to a few of these sources of evidence in the main body of this report. These specific sources we refer to are those which we regard as being especially authoritative, or which provide a good overview or summary of evidence.

2.3
Interviews
with key
stakeholders

We have conducted 12 interviews with members of the liP UK Visioning Group, specialist panel members and experts in the health and wellbeing field. These interviews focused both on the wider business case for promoting health and wellbeing at employer level, and the pros and cons of including more health and wellbeing factors in the next version of the liP UK Standard.

3. The business case for employee health and wellbeing

3.1 Reflections on the research literature There is now a growing and (mostly) authoritative body of evidence which highlights the benefits which organisations can derive from a healthier workforce – especially as a result of workplace interventions by employers. Busy practitioners trying to distil the key messages from this research may find this a bewildering and time-consuming process. This section is intended as a guide to the main findings but, before looking at these in more detail, we have ten reflections on the way some of the evaluation and ‘business case’ research was designed, conducted or presented which may help the ‘lay’ reader differentiate between robust, reliable research and that which is less illuminating.

- 1. Questionable research design:** The quality of the research in this area is improving, but many of the published evaluation studies fail to include control groups, have imprecise success criteria and test the outcomes of interventions over too short a time frame. These limitations can mean that the conclusions authors reach – and the claims they make about the success or otherwise of workplace health interventions – cannot be attributable to the intervention used or be easily verified, tested or duplicated.
- 2. Relying on ‘take-up’ as a measure of success:** In several of the studies the ‘take-up’ or participation rates of employees in workplace health initiatives is too frequently the dominant (or only) measure of success. However, participation (for example, in a smoking cessation initiative) does not necessarily equate to behavioural change or lead to a reduction in sickness absence. Indeed, the ‘inverse care law’ suggests that a significant proportion of participants in such initiatives may be those least in need of support, and that the hardest to reach (eg heavy smokers) remain largely untouched.
- 3. Workplace-only causes and cures:** One of the limitations of workplace health promotion initiatives aimed at changing lifestyle behaviour is that they are restricted to behaviour in the workplace or workplace causes of ill-health. In reality, of course, tobacco consumption, obesity, diet, exercise etc are all aspects of lifestyle which are more likely to be initiated or practiced away from the workplace. Thus, it might be possible to reduce or eliminate tobacco consumption at work, but there are no guarantees that consumption outside work will not continue or even increase. Few studies account for this dimension which, in some contexts, might explain the often weak link between improved workplace behaviour and outcomes such as sickness absence levels. A related, underlying issue is that many studies appear to assume that work itself is usually the primary cause of ill-health among the working age population. While work can be a cause of ill-health, or make pre-existing conditions worse, recent

authoritative work (Coats and Max, 2005; Waddell and Burton, 2006) makes clear that – in the vast majority of cases – work is good for health, especially if it is good quality work.

- 4. Productivity and performance:** A number of the more recent studies make rather bold claims regarding labour productivity and performance improvements. Too many of them, however, rely on self-reported measures of productivity. These are very subjective measures and depend on individual workers giving an honest and accurate retrospective assessment of either their overall productivity or their performance on more specific tasks. Overall, it is surprising how little robust research exists on the relationship between health and individual job performance.
- 5. Attribution:** In any study which uses an experimental design (eg with a control group) an important issue is that of attribution – or proving cause and effect. Thus, an initiative to reduce back injury may appear to lead to reductions in long-term absences. However, it is important to take full account of other factors which might also contribute to this effect before drawing firm conclusions. For example, changes in absence policy, earlier referral to occupational health specialists, use of attendance bonuses etc may all contribute to a reduction in absence levels. Many studies restrict their evaluations to only a limited range of explanatory factors, making definitive conclusions about 'cause and effect' difficult to make.
- 6. Dead-weight effect:** Even if changes in behaviour are observed, there is still the problem of determining whether some of these changes would have happened anyway, regardless of the health promotion intervention. For example, a post-Christmas weight-loss programme may precede a measurable reduction in obesity. However, determining the extent to which this loss would have been registered in any case (in the absence of a programme) can be difficult to estimate.
- 7. Time lags:** One area where the literature suggests a problem, but is less good at providing solutions, is the time-lag between interventions and any measurable behaviour change. Many employers are impatient for quick results once they have invested in a workplace health initiative, but the research is generally poor at helping us understand how long we should wait before we see the results.

- 8. Sustainability:** Even if a workplace initiative is successful in changing employee behaviour in the short-term, many evaluation studies only rarely conduct systematic analysis of how long these changes are sustained. It might reasonably be expected that only sustained behavioural change will lead directly to tangible bottom-line outcomes such as a reduction in absence levels. If, however, a significant proportion of employees who take up regular exercise subsequently lapse back into a more sedentary lifestyle the real impact of the initiative will be diminished.
- 9. Focus on large organisations:** If researchers are looking for populations of employees within which to conduct research on workplace health, the best place to look will be large organisations. While this makes perfect sense – and is the obvious way to get sample sizes big enough to draw meaningful conclusions – it has at least one major problem associated with it. As most UK employees work in organisations with fewer than 50 employees, it is not certain how readily the conclusions from research conducted in large firms can be applied to those in small and medium-sized enterprises (SMEs).
- 10. Co-morbidity:** With a few notable exceptions, it is rare to find research studies which acknowledge that employees often have more than one medical condition, and that this ‘co-morbidity’ may well influence the severity of their problem, their performance at work or their likelihood of a swift return to work. For example, employees with chronic low back pain or arthritis may also suffer from depression or anxiety. Studies which ignore the significance of the often subtle inter-relationships between medical conditions can fail to reflect the complexity of the problem or workplace health and wellbeing.

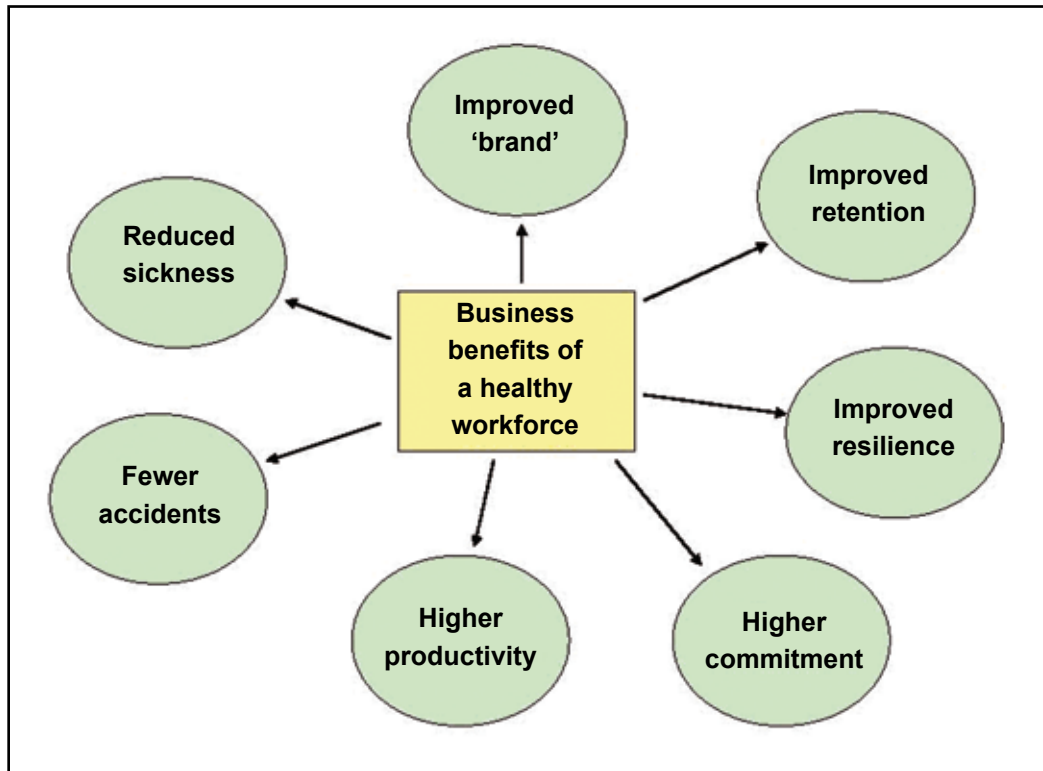
3.2
So, what are
the business
benefits of
healthy
employees?

Distilling the core findings from the available research, Figure 1 on the next page identifies the main benefits to be derived from having a healthier workforce.

3.2.1 Reduced absence from work

Every year in the UK 200 million days are lost through sickness absence – an average of 8.5 days lost per annum – at an estimated cost of £13 billion, according to the CBI. And each week, one million people (almost 4 per cent of the workforce averaged out over a year) take time off work due to illness, and 3,000 people move from Statutory Sick Pay onto Incapacity Benefit. As a healthy workforce has lower sickness absence, it is clear that employers can achieve significant cost savings if they can reduce their absence by improving employee health and wellbeing at work.

Figure 1: Business benefits of a healthy workforce



Source: The Work Foundation

Despite growing concern over sickness absence among employers, virtually no robust data exists on its direct or indirect costs. The CBI estimates that only 25 per cent of UK employers calculate their absence costs. Various other bodies have sought to estimate the costs of absence at aggregate level. The majority of the cost data which is published, however, is based solely on estimates of the direct salary costs of employees off sick. While some include wider employment costs (such as National Insurance), and others seek to estimate management time, temporary replacement costs and overtime payments, these are few and far between. The limitations of the current approaches to costing sickness absence in the UK have a number of consequences:

- At the current level of aggregation, such large numbers (eg £13 billion) have little impact on the perceptions or behaviour of individual employers;
- Aggregate cost figures do not deal comprehensively or consistently with the indirect costs of absence. These include the costs of temporary cover, management time, reduced productivity and reduced customer retention;

- Aggregate cost figures are not sufficiently sensitive to gender, sectoral, occupational or regional differences in absence patterns and costs;
- Very little is known about the factors affecting variations in the costs of absence and, therefore, their susceptibility to measurement, monitoring, prediction, management and control;
- Aggregate cost figures do not differentiate between short-term and long-term absence costs;
- Aggregate cost figures fail to differentiate between 'casual' absence, absence attributable to domestic caring responsibilities, and absence caused by genuine illness or injury.

Here is a simplified example of calculating the cost of absence:

Retail company – 5,000 staff	
Just using basic salary data (ie excluding National Insurance, management time etc), this company's raw absence costs look like this:	
Staff work a 37 hour week for £6 per hour	£222 per week per employee
Across 5,000 staff, this is a weekly paybill of	£ 1,110,000
This is a monthly paybill of	£ 4,440,000
And an annual paybill of	£53,280,000
Every 1 per cent of sickness absence will cost	£ 53,280 each year
An average of 4 per cent absence will cost	£213,120 each year

Measuring costs of absence though also need to take account of indirect costs such as costs of employing and training temporary cover staff. In addition to the indirect and direct costs mentioned above, some approaches to absence costing do not allow for 'opportunity costs' that are harder to quantify but still important in building up a true picture of the total cost of absence. These include:

- Lost sales;
- Lost customers;
- Inability to take on new contracts;
- Inability to fulfil existing contracts.

The limitations of most absence costing methods make it a reasonable conclusion that most UK employers are seriously underestimating the costs of sickness absence. If this is true, then most will be similarly unaware of the financial benefits of reducing absence.

Evidence from previous research (Bevan and Hayday, 2001) shows that many employers' approaches to measuring and monitoring absence leave much to be desired. Several studies have suggested that employers spend in the region of 9 or 10 per cent of their annual payroll managing the direct and indirect consequences of sickness absence. In addition, failure to address short-term absences can increase the risk of increasing longer-term absence from work. Indeed, there is growing evidence that these risks are already increasing, as 27 per cent of the UK workforce – the second highest in the EU – report that they have a long-standing and work-limiting incapacity (Eurostat, 2003).

Highlighting the stark and immediate financial consequences of employee absence from work can be persuasive to some audiences. But there are other operational consequences of absence which can also grab the attention of senior managers. Most employers, for example, need a high degree of predictability and continuity of attendance among their employees to allow them to meet the expectations of their customers and clients. The recent Boorman Review of the health and wellbeing of NHS employees calculated that, if absence levels in the NHS were reduced to the average of the private sector, 15,000 additional staff would be available each day to deliver patient care. This would represent an annual cost saving of around £500 million (Boorman, 2009).

Many are also concerned that they will incur extra costs when staff are absent by having to pay overtime or engage temporary workers to get the work done. Others are worried that staff with stress, or a mental illness, or conditions covered by the Disability Discrimination Act (DDA) will have recourse to law if they feel that their work has contributed to their absence or incapacity. Some employers only experience short periods of staff absence caused by colds, sprains and minor ailments. While these can be disruptive, they are generally manageable. However, an increasing number of organisations have staff away from work for longer periods because of chronic physical conditions or through mental ill-health problems such as depression or anxiety, for example. Long-term absence can be more complex and costly to manage and have more significant consequences for employers, especially smaller employers.

The Royal Mail have experienced issues of long-term absence – especially related to musculoskeletal health – for many years. In 2003 their sickness absence levels were 7 per

cent (an average of 16 days per employee per year) and a daily cost of £1m. Customer service standards were also being affected. Royal Mail introduced a range of integrated measures:

- Health screening;
- Health clinics at 90 sites;
- Fast access to occupational health services;
- Access to physiotherapy;
- Employee assistance programme (EAP);
- Incentive scheme;
- Rehabilitation centres focusing on improving back, neck and shoulder injuries;
- Phased and partial return to work (RTW);
- Case management.

After four years, sickness absence levels had fallen to 4 per cent (10 days per employee) and saved Royal Mail almost £230m. Up to 3,600 more staff were available to work each day as a result of these measures (Marsden and Moriconi, 2008).

Overall, then, the research suggests that there are both financial and operational benefits to having a healthy workforce with lower than average sickness absence levels. Further, those organisations which are best able to realise these benefits are those which:

1. Measure and monitor their absence levels, and can highlight both trends over time and 'hot-spots' across the organisation.
2. Calculate and track the costs of sickness absence, especially if they can quantify the indirect costs (ie by going beyond salary costs alone).
3. Have clear and simple attendance management policies and procedures, especially if they emphasise the role of employees and their line managers.
4. Have access to responsive occupational health services which can help intervene early in complex cases of long-term absence and which can facilitate early return to work.
5. Adopt simple but targeted workplace health promotion practices to improve employee awareness of health and lifestyle issues (eg diet, exercise, smoking) through education, information and involvement (Pilgrim, 2008).
6. Recognise through action that sickness absence is lower among highly motivated, engaged and well-managed employees, who are working in good quality jobs with high levels of control and discretion (Coats and Max, 2005).

3.2.2 Reduced accidents at work

There are at least one million workplace injuries caused by accidents each year, according to the Health and Safety Executive (HSE). The direct and indirect costs of some of these accidents can be very high and, while many organisations insure themselves against personal injury claims and public liability, there are a number of additional costs which remain uninsured. These include:

- Lost time;
- Sick pay;
- Damage or loss of product and raw materials;
- Repairs to plant and equipment;
- Extra wages, overtime working and temporary labour;
- Production delays;
- Investigation time;
- Fines;
- Loss of contracts;
- Legal costs;
- Loss of business reputation.

While poor working practices, failure to implement or follow health and safety procedures and ineffective management are all important causes, there is growing evidence that poor health and wellbeing among employees can also be a significant contributory factor. Some research studies have identified fatigue due to poor sleep, for example, as a risk factor in some accidents at work (Åkerstedt et al, 2002). Others have estimated that 20 per cent of accidents on motorways are attributable to fatigue – many of these accidents involve people driving to, or while at, work. This can be especially important among the 3.5 million UK workers who work shifts. Indeed, the research suggests that accidents attributable to fatigue cost UK employers up to £240m each year (Danna and Griffin, 1999). Other research has demonstrated that older workers, those in poor quality jobs, those who take less exercise and those who smoke are also more vulnerable to sleep or concentration problems which increase the risk of accidents.

There is less research on the effectiveness of workplace health promotion on accident rates at work, though case study evidence gathered by PriceWaterhouseCoopers (PWC, 2008) suggests that cost reductions averaging 50 per cent have been achieved across a number of organisations when they have implemented initiatives to improve employee health and wellbeing. Initiatives to improve hydration, sleep, the uptake of rest breaks and so on, can

improve alertness, concentration and judgement, especially in high risk industries such as construction.

3.2.3 Improved retention

The cost of replacing lost staff can be considerable. A study by Ceridian (Ceridian, 2008) estimated that unnecessary exits from organisations could be costing UK businesses almost £5.2 billion each year. The CIPD estimates that the direct and indirect costs of replacing a leaver averages almost £6,000 (masking big differences between different job roles). While there is no standard formula, most experts agree that the total replacement cost can, in some cases, be up to 100 per cent of annual salary. The precise figure will depend on how long the post is vacant and how the work is done during this time, the costs of recruitment (especially if an agency is involved) the costs of training the new post-holder and their initial drop in productivity. Other costs, such as management time, lost customers and other related disruption, can also be incurred but are more difficult to quantify.

There is a growing body of evidence that – at a psychological level – many of the factors associated with sickness absence also affect employee retention. Employees who feel demotivated or disengaged from their work, or who find aspects of their work stressful, or who have poor working relationships with colleagues, or who feel their job is not worthwhile are more prone to periods of absence and are more likely to resign their posts, especially if they feel (rightly or wrongly) that an alternative job would be better. These dimensions of psychological wellbeing are known to affect the ‘attachment’ of the individual to the organisation, loyalty to it and their resilience to pressure or change (Bevan, Barber and Robinson, 1997). The situation can, of course, be improved through good management, well designed jobs and effective teamwork and communication. In particular, it can be helped if the employee feels that the organisation cares for their wider health and wellbeing and if they feel supported.

In the context of health and wellbeing, retaining staff is not just about preventing them from choosing to resign. Retention can also mean:

- Supporting an employee to remain in work when they develop an incapacity or become disabled;
- Supporting an employee to return to work after a period of long-term absence when they may otherwise have gone onto benefits and left the labour market completely;
- Supporting an employee to return to work after a career break or a period of maternity leave when they may have decided to join an organisation with more suitable hours or a more positive approach to flexible working.

In each of these scenarios the direct and indirect cost savings which can be derived may be considerable, depending on the demography of the workforce. For example, several organisations have managed to achieve very high retention rates (ie above 80 per cent) among female employees who have taken maternity leave. In fact, BT's work-life balance policy created a £3m saving in recruitment costs in the year to March 2003 since 98 per cent of women returned after maternity leave. Not only does this avoid incurring replacement costs but it retains expertise, know-how and often high-value customer relationships. Similarly, if employees with long-term illness or chronic conditions can be retained and rehabilitated (even in transitional employment or in different roles), significant cost savings and skill/knowledge retention can be achieved, Bevan et al, 2009).

3.2.4 Higher employee commitment

The relationship between employee health and employee commitment and engagement is multifaceted. Indeed, there is research evidence that suggests a two-way, possibly self-reinforcing, relationship: healthy employees are more committed **and** committed employees are more healthy.

Healthy employees – whose physical and psychological wellbeing is good – can demonstrate higher levels of commitment than those who are less healthy. This commitment can manifest itself in more than one way. First, employee commitment to the organisation can be enhanced. Committed employees are more likely to identify with the values of their organisation, be proud to work for it and want to exert effort on its behalf. They tend to work harder and are more willing to give 'discretionary effort'. In addition, they are significantly less likely to resign and they have lower sickness absence.

Second, committed employees are more likely to deliver high value customer service. Several studies have collected data on the factors which drive high levels of customer satisfaction and retention. Many have found that engaged and committed employees have a significant influence on customer outcomes and on sales performance (Rucci et al, 1998). Others have found that poor health among employees, and high levels of sickness absence, can damage this effect. UK research among 65,000 staff in a large UK retailer (Barber et al, 1999) found that low levels of employee commitment led to higher levels of absence, and that high absence led to lower satisfaction and 'spend' among customers. Indeed, stores with higher absence had lower profits. The study found that a 20 per cent increase in employee commitment led to an increase in sales of 9 per cent per store each month. This effect was greatly diluted when employee health was poor and sickness absence was high. More recent studies have confirmed this effect in other service sector organisations (Bates, Bates and Johnston, 2003).

Some of the factors which affect employee commitment are the same as those which affect aspects of health. A major and long-standing study of UK civil servants has been collecting data on health and wellbeing for many years. One of the drivers of this research, Michael Marmot, (Marmot, 2004) has compelling evidence that employees in jobs which are less likely to generate commitment have worse health. He suggests that workers in lower status jobs enjoy worse health and lower life expectancy than workers in higher status jobs. This is often described as the 'social gradient' in health. The argument can be summarised quite simply. Workers in lower status jobs are exposed to more stressors than their more highly paid and highly qualified colleagues, which, in turn, increases the risk of mental illness, gastro-intestinal conditions and coronary heart disease (CHD). Contrary to the popular misconception, the security guard in the entrance lobby is a more likely heart attack victim than the archetypal 'highly stressed' senior manager on the executive floor. Of course, workers in these lower status jobs are more likely to be affected by other negative social factors such as poor housing or unalleviated caring responsibilities. However, studies which have controlled for these elements point strongly to the significance for health of work organisation, job design and organisational culture – all important determinants of employee commitment too. Professor Marmot's findings about the impact of job quality on health have recently been reinforced in his review of health inequalities in the UK (Marmot, 2010).

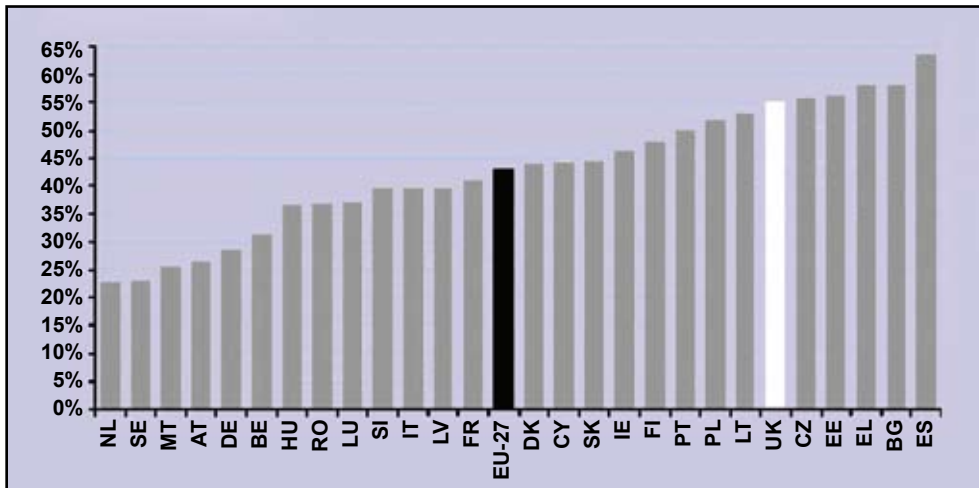
Recent evidence from a pan-EU study of the quality of working life suggests that workers in the UK are generally unhappy about the amount of intrinsic interest in their work (too little) and the amount of monotony they experience in their jobs (see Figure 2 on the next page).

There are now many case studies from progressive organisations who have realised that employee commitment (leading to higher performance) is closely linked to employee health and wellbeing and that any measures to improve both in tandem can have both far-reaching and enduring positive effects.

3.2.5 Higher labour productivity

Some of the research on employee health makes a number of bold claims about productivity. In reality, there is less evidence of the link than might be imagined, though this is partly because researchers have only recently been able to adopt measures of work performance and productivity which go beyond subjective measures.

Figure 2: Percentage of UK workers who report monotony at work



Source: European Working Conditions Survey 2005

There now seem to be a number of aspects of job performance which are demonstrably better if employees are healthy – both physically and psychologically. These include:

- Energy;
- Concentration;
- Decision-making;
- Resilience;
- Coping with pressure;
- Coping with uncertainty;
- Coping with critical feedback;
- Coping with change;
- Being supportive of colleagues;
- Customer-orientation;
- Completion of tasks;
- Reliability.

One of the IIP-funded UK studies which was reviewed for this project attempted to construct a set of 'hard' measures of team performance across a number of organisations (Harvey, et al, 2007). This showed that sickness absence levels and team performance were clearly linked, and that conditions such as depression can have an especially damaging effect.

A US study (Simon et al, 2000) found that, after a year of treatment, workers with depression and anxiety were 25 per cent more likely to return to full productive capacity at work compared with those who received no treatment. In addition, the healthcare costs to employers fell by a third.

One related area where there has been a recent growth in research interest is in so-called 'presenteeism'. This can be defined as lost productivity that occurs when employees come to work but perform below par due to any kind of illness. We can see this quite often among senior managers. Typically, more senior managers record far less sickness absence than more junior staff. This is probably not because they are significantly healthier, but might have higher levels of commitment (or a mistaken belief in their indispensability!). It also means that a higher proportion still go to work when they are ill and, as a result, run the risk of performing sub-optimally.

There are a number of studies which now attempt to quantify the cost implications of 'presenteeism'. A number of measurement tools are now being used to collect standardised data on 'reduced work effectiveness' or 'activity impairment'. A study by the Sainsbury Centre for Mental Health (SCMH, 2007) estimated that presenteeism caused by mental ill-health in the UK alone – predominantly depression and anxiety – represented an annual cost of over £15 billion. Indeed, the research suggests that presenteeism costs 1.5 times more than absence due to mental health.

A US study looked at the impact of obesity and lost productivity at work (Ricci and Chee, 2005). They calculated that obese or overweight workers lost productive time at work to a value of over \$42 billion (compared with less than \$12 billion among workers of normal weight). Clearly, excess weight is a risk factor for heart disease, hypertension, diabetes and some cancers, and employees with these kinds of medical conditions are likely to have higher absenteeism and greater 'presenteeism' than healthy employees.

In Unilever a study looking at the causes, costs and consequences of presenteeism (Tscharnezki 2008) found that presenteeism accounted for three times as much lost productivity as absence from work. The study identified that mental health problems and sleep disorders accounted for about half of this lost productivity, with musculoskeletal disorders (MSDs) accounting for a large part of the remainder. It calculated that this lost productivity equated to 21 days per employee per year – a total cost of over 7 million euros each year.

Presenteeism is an area of investigation which is adding to our understanding of the direct and indirect costs to business of lost productivity due to ill-health. Up until now it has proven difficult to quantify. The evidence now emerging is that it may represent a serious drain on organisational resources and can, in addition, reduce employees' quality of life.

3.2.6 Enhanced employer brand

The rhetoric about the so-called 'war for talent', if nothing else, has raised awareness among most employers that attracting the best candidates is a competitive business. With a more highly educated workforce, even in a relatively depressed labour market, the cream will rise to the top and the best people will be in demand. For the last twenty years or so, researchers have turned their attention to understanding not just what employers want of their new recruits, but what potential employees expect of their prospective employers (Schwab, 1987; Turban and Greening, 1996; Highhouse and Hoffman, 2001; Bevan and Willmott, 2002).

What these studies tell us is that, in addition to good pay, career prospects and opportunities for advancement, a growing proportion of workers are attaching importance to the ethical reputation of the organisation and its ability to offer appropriate work-life balance. The Guardian Newspaper's 'GradFacts' website conducts an annual survey of graduates' attitudes to the job market and in the 2008 survey (The Guardian, 2008) two-thirds of respondents said they needed to feel happy with an employer's ethical record before accepting a job offer. Of these, a third defined 'ethical' in terms of the treatment of employees.

Several UK businesses are now promoting their emphasis on work/life balance, flexible working and workplace health in the 'Careers' pages of their websites (Unilever, BT and GlaxoSmithKline for example). This reflects an awareness that potential recruits have concerns over long-hours working and the importance of targets and delivery to deadlines. Organisations which pay attention to these issues – and deliver real access to flexibility and workplace health interventions, rather than just promise them – will clearly do better at attracting candidates for whom these issues are important.

There are many characteristics of the so-called 'magnet' employer, and these vary depending on the segment of the labour market being targeted. What is clear is that the caring employer, who demonstrates that they take employee wellbeing seriously, is most likely to attract good candidates, have fewer vacancies left unfilled for long periods and – if they can deliver on the promise – lose fewer staff to competitors.

3.2.7 Greater employee resilience

Healthier employees are, in general, more resilient and better able to cope with the changes, uncertainty and ambiguity which are now more common in modern organisations (Business in the Community, 2009). Several aspects of the world of work have been changing in the last decade:

- The **intensification of work** has increased. This is in part due to the growth in the use of information and communication technology (ICT) which has speeded up the movement of data and made time and deadline pressures more acute. ICT has also led to greater surveillance and a feeling, among some workers, that their discretion and autonomy at work is being undermined.
- The **complexity and pace of life** inside and outside work has intensified too. Working hours in the UK have been long compared with most of our EU competitors, and work/life balance has been more difficult to achieve, especially for those with childcare or eldercare responsibilities (sometimes both), complex travel to work arrangements and fragmented family structures.
- An **expectation that employees will be flexible**, agile and can cope with changes to roles, organisational structures, strategy. There is evidence that concern over job insecurity, after recent falls, is rising again and that employees crave stability at work rather than constant change or uncertainty.
- Growth in the incidence of **common mental health** problems among the working age population. The direct costs of sickness absence due to mental health are high in the UK, with about £8.5 billion or 70 million working days lost. For those employees susceptible to depression and anxiety because of financial, marital or other health problems (eg chronic conditions) a psychologically unhealthy workplace can be a dangerous place.

A number of studies have identified that employee resilience can be strengthened through workplace interventions and by leaders who can recognise the vulnerability of staff to pressure and anxiety (Barling, 2000; Palmer, 2000; Turner, 2002). Staff who fail to cope with the demands of modern workplaces, often through a lack of support, are at significantly higher risk of reduced productivity or of resignation. Several authors have highlighted that improved employee resilience during times of organisational change and uncertainty can be beneficial (Bell, 2002, Cressey, 2009, Lowe, 2004).

3.3 In this section we have explored seven areas where improvements to employee health are likely to lead directly or indirectly to improvements in aspects of business performance. These may be just financial savings, through cost reduction or added value performance. They may also be through enhanced customer relationships or the ability to attract and retain high quality, creative and committed employees.

Overview

It is worth mentioning, however, that many of the businesses who are regarded as 'leading edge' and innovative in the field of workplace health have never made a formal business case to help justify an initiative or an intervention. More often, they start with a specific problem in one location or department and experiment with a health-related solution. They then assess its impact and follow this up with a 'pilot' intervention on a slightly larger scale. The business benefits are derived gradually, and build up over a period of time. Thus, the business case evolves.

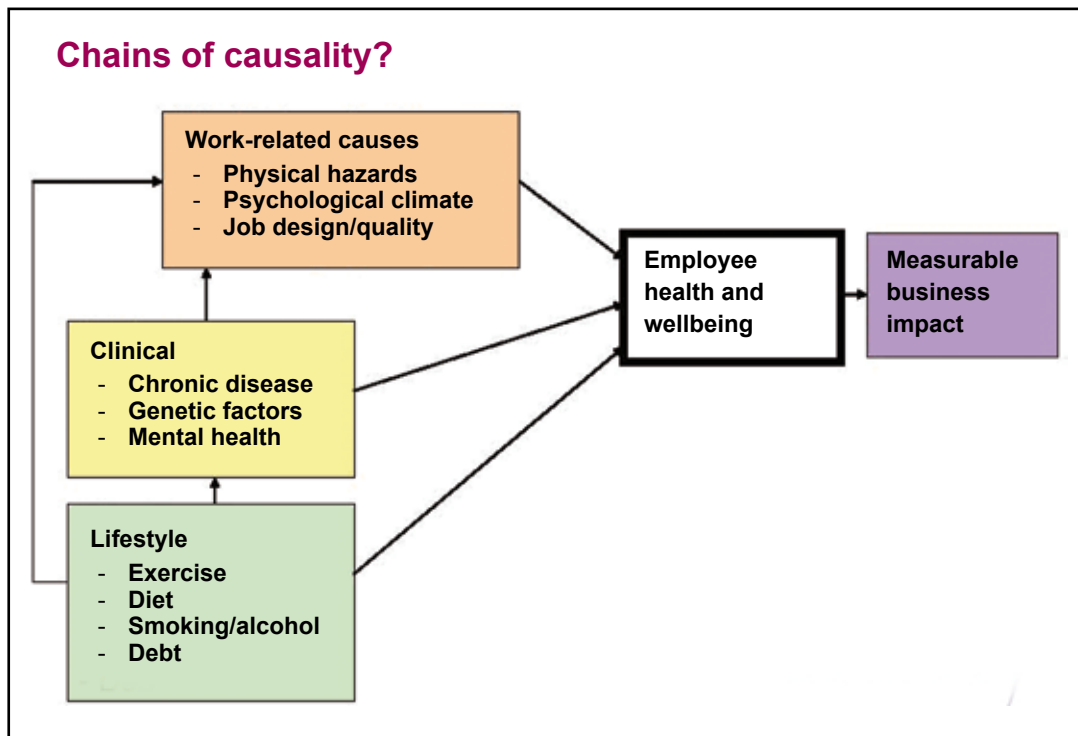
4. Conclusions

4.1 Most adults spend a high proportion of their lives at work. As well as income, the workplace is where many of us find friendship, fulfilment and the emotional interactions that enrich our lives. **How does work affect employee health?** Policy makers insist with some vigour that unemployment has a corrosive effect on wellbeing and overall happiness. And the association of worklessness with poor physical and mental health is now endorsed by a weight of unquestionable evidence (Marmot, 2004; Waddell and Burton, 2006). We now have a tide of evidence that work itself – especially if it is ‘good’ work – can be good for our health (Coats and Lehki, 2008). Employers who ignore this evidence, and its implications, are missing out on an opportunity to enhance their reputations and their profits.

Yet we must take care not to pretend that employers are the only influence on employee health. The government and, indeed, individual citizens must also play a prominent part in improving the health of the UK’s working age population. This is fast becoming both an economic, social and clinical imperative. Dame Carol Black estimates that ill-health among the UK’s working age population costs the economy £100 billion each year – equivalent to the annual cost of running the NHS and the GDP of Portugal. Dealing with this problem is a shared responsibility.

Figure 3, below illustrates that there are other forces which affect employee health and wellbeing beyond the workplace.

Figure 3: Influences on employee health and wellbeing



Source: The Work Foundation

Conclusions

The figure shows that both the lifestyle and clinical factors can directly impact on employee health and performance without any influence by the workplace. Of course, pre-existing health conditions can always be made worse by work, and this is where the employers' legal duty of care and, indeed, their moral responsibility kicks in.

4.2 Many businesses have conflicting emotions about workplace health. They have a genuine concern for the welfare of their staff, but are equally resistant to regulation and 'nannying'.
How can employers be guided and supported? Employers often recognise that their businesses benefit in many ways from a healthy and engaged workforce, yet the same employers can equally be reluctant to invest in long-term (and sometimes even short-term) measures to improve the health of their workplaces.

As in so many other realms, employers – and especially SMEs – want guidance and support, but with a light touch. They want this support to go 'with the grain' of business, and not to interfere with the natural rhythm of the way they conduct themselves.

So we have a very big (and growing) national issue, which we must tackle with subtlety and sensitivity if we are to get businesses to engage. We think it is possible to argue that workplace health represents – both now and over the next thirty years – as big a threat to the UK's productivity and competitiveness as our skills and training deficit. Health at work can not be an liP UK 'sideline' which supplements its existing good work to promote the adoption of training and development practices among UK employers. It must become mainstream.

The Work Foundation believes that liP UK has a pivotal role to play, not just in promoting the message about health at work, but in delivering accessible and relevant support to employers across all sectors and of every size as they struggle to provide healthy working environments and good quality jobs within which employees can drive forward our national productivity and competitiveness.

Appendix 1. Bibliography

- Åkerstedt, T., Knutsson, A., Westerholm, P., Theorell, T., Alfredsson, L., Kecklund, G. Work organisation and unintentional sleep: results from the WOLF study, *Occupational and Environmental Medicine* 2002;59:595-600
- Aldana, S. G. Financial impact of health promotion programs: a comprehensive review of the literature. *Am.J.Health Promot.* 2001;15:296-320
- Aldana, S. G., et al. Financial impact of a comprehensive multisite workplace health promotion program. *Preventative Med.*2005;40:131–137
- Allen, H., Hubbard, D., Sullivan, S. The burden of pain on employee health and productivity at a major provider of business services. *J.Occup.Environ.Med.* 2005;47:658-70
- Anderson, D. R., Whitmer, R. W., Goetzel, R. Z., Ozminkowski, R. J., Dunn, R. L., Wasserman, J. et al. The relationship between modifiable health risks and group-level health care expenditures. Health Enhancement Research Organization (HERO) Research Committee. *Am.J.Health Promot.* 2000;15:45-52
- Anderzen, I. & Bengt, A. (2005). The Impact of a Prospective Survey-Based Workplace Intervention Program on Employee Health, Biologic Stress Markers, and Organisational Productivity *JOEM Vol. 47:7 pp 671 – 682*
- Aronsson, G., Gustafsson, K. & Dallner, M. 'Sick but yet at work. An empirical study of sickness presenteeism', *Journal of Epidemiology and Community Health* 54, 502–509, 2000
- Barber, L., Hayday, S. & Bevan, S. M, *From People to Profits*, IES Report 375, 1999
- Barling, J., Moutinho, S. & Kelloway, E. Transformational leadership and group performance: the mediating role of affective commitment, Queens' University, Kingston, Ontario, 2000
- Barrick, M. R. & Mount, M. K. (1991). The big five personality dimensions and job performance: a meta analysis. *Personal Psychology, Spring 1991, 44, 1*
- Baun, W. B., et al. A preliminary investigation: effect of a corporate fitness program on absenteeism and health care cost. *J Occup Med.* 1986;28:18–22
- Bates, K., Bates, H. & Johnston, R. (2003), Linking Service to Profit: The Business Case for Service Excellence. *International Journal of Service Industry Management*, 14(2), pp 173-183
- Bell, M. (2002), The five principles of organisational resilience. Gartner Inc. AV – 15 – 0508
- Bertera, R. L. The effects of behavioral risks on absenteeism and health-care costs in the workplace. *J.Occup.Med.* 1991;33:1119-24
- Bertera, R. L. Behavioral risk factor and illness day changes with workplace health promotion: two-year results. *Am J Health Promo.* 1993;7:365–373
- Bertera, R. L. The effects of workplace health promotion on absenteeism and employment costs in a large industrial population. *Am J Public Health.* 1990;80:1101–1105
- Bevan, S., Barber, L. 7 Robinson, D. (1997). Keeping the Best: A Practical Guide to Keeping Key Employees, Report 337, Brighton: Institute for Employment Studies (IES)

Bibliography

- Bevan, S. & Hayday, S. Costing Sickness Absence in the UK, IES Report 382, 2001
- Bevan, S. M., Passmore, E. & Mahdon, M, *Fit for Work? Musculoskeletal Disorders and Labour Market Participation*, The Work Foundation, 2007
- Bevan, S. M. & Willmott, M, *The Ethical Employee*. London: The Work Foundation/The Future Foundation, 2002
- Bevan, S., Quadrello, T., McGee, R., Mahdon, M., Vavrovsky, A. & Barham, L. (2009). *Fit for Work? Musculoskeletal Disorders in the European Workforce*. London: The Work Foundation
- Biener, L., Glanz, K., McLerran, D., Sorensen, G., Thompson, B., Basen-Enquist, K., et al. Impact of the Working Well Trial on the worksite smoking and nutrition environment. *Health Education Behavior* 1999;26:478–94
- Bly, J. L., et al. Impact of worksite health promotion on health care costs and utilization: evaluation of Johnson & Johnson's Live for Life Program. *JAMA*. 1986;256:3235–3240
- Boles, M., Pelletier, B., Lynch, W. The relationship between health risks and work productivity. *J.Occup.Environ.Med*. 2004;46:737-45
- Bond, F. & Bunce, D. Job control mediates change in a work reorganization intervention for stress reduction *J Occup Health Psychol* 2001;6:290-302
- Bond, F. W. & Bunce, D. (2003). The role of acceptance and job control in mental health, job satisfaction, and work performance. *Journal of Applied Psychology* 2003, Vol. 88, No. 6, 1057-1067
- Bondreau, F., et al. Health risk appraisal in an occupational setting and its impact on exercise behavior *J Occup Environ Med* 1995;37(9):1145-50
- Boniwell, L. & Henry, J. (2007). Developing conceptions of wellbeing: Advancing subjective, hedonic and hedonic theories *Social Psychological Review*, 9, 3-18
- Boorman, S. (2009), NHS Health and wellbeing, Department of Health
- Bowne, D. W., et al. Reduced disability and health care costs in an industrial fitness program. *J Occup Med*. 1984;26:809–816
- Brouwer, W. B., Meerding, W.-J., Lamers, L. M. & Severens, J. L. (2005). The relationship between productivity and health-related QOL. *Pharmacoeconomics* 2005, 23 (3), 209-218
- Burton, W. N., Conti, D. J., Chen, C. Y., Schultz, A. B., Edington, D. W. The role of health risk factors and disease on worker productivity. *J.Occup.Environ.Med*. 1999;41:863-77
- Burton, W. N., McCalister, K. T., Chen, C. Y., Edington, D. W. The association of health status, worksite fitness center participation, and two measures of productivity. *J.Occup.Environ. Med*. 2005;47:343-51
- Burton, W. N., Pransky, G., Conti, D. J., Chen, C. Y., Edington, D. W. The association of medical conditions and presenteeism. *J.Occup.Environ.Med*. 2005;46:S38-45

- Burton, W. N., et al. The economic costs association with body mass index in a workplace J Occup Environ Med 1998;40:786-793
- Business in the Community (2009), The emotional resilience toolkit, London: BITC
- Bycio, P. (1992). Job performance and absenteeism: A review and meta-analysis. *Human Relations* 1992, 45, 193
- Campbell, M. K. et al. Effects of a tailored health promotion program for female blue collar workers: Health works for women Preventative Medicine 2002;34:313-23
- Ceridian Corporation, Pay Research, July 2008
- Chamberlain, K. & Zika, S. (1992). Stability and change in subjective wellbeing over short time periods. *Social Indicators Research*, 20, 101-117
- Chapman, L. S. Meta evaluation of the worksite health promotion economic return studies: 2005 update The Art of Health Promotion July/August 2005
- Chapman, L., et al. Ten-year economic evaluation of an incentive-based worksite health promotion program. Am J Health Promo. 2005
- Coats, D. & Max, C. Healthy Work: Productive Workplaces. Why the UK needs more 'Good Jobs', London:The Work Foundation, 2005
- Coats, D. & Lehki, R., 'Good Work': Job Quality in a Changing Economy, London: The Work Foundation, 2008
- Collins, J. J., Baase, C. M., Sharda, C. E., Ozminowski, R. J., Nicholson, S., Billotti, G. M., et al. The assessment of chronic health conditions on work performance, absence, and total economic impact for employers. J.Occup.Environ.Med. 2005;47:547-57
- Costa, P. T., McCrae, R. R. & Zonderman, A. (1987). Environmental and dispositional influences on wellbeing: Longitudinal follow-up of an American national sample. *British Journal of Psychology*, 78, 299-306
- Cressey, P. (2009). The Concept of Resilience: Its components and relevance to the organisation – a theoretical and empirical analysis. UK Work Organisation Network (UKWON)
- Cropanzano, R. & Wright, T. (1999). A five-year study of change in the relationship between wellbeing and job performance *Consulting Psychology Journal: Practice and Research*, Vol 51, No. 4, 252-265
- Dalton, B. A., Harris, J. A comprehensive approach to corporate health management. J Occup Med. 1991;33:338-348
- Danna, K. & Griffin, R. (1999), Health and Wellbeing in the workplace: A Review and synthesis of the literature, Journal of Management, 25(3), pp 357-384
- De Greef, M. & Van den Broek, K. Making the case for workplace health promotion: analysis of the effects of WHP 2004 European Network for Workplace Health Promotion Department of Health, (2004) Choosing Health. Making Healthier Choices Easier. CM6374. HM Stationary Office.

Bibliography

- Derryberry, D. & Read, M. A. (1994). Temperament and attention: orienting toward and away from positive and negative signals. *Journal of Personality and Social Psychology*, 68, 1128-1139
- Diener, E. (1984). Subjective wellbeing. *Psychological Bulletin*, 95, 542-575
- Dille, J. H. A worksite influenza immunization programs impact on lost work days, health care utilization, and health care spending AAOHN J 1999;47(7):301-309
- Dixon, S. Implications of population ageing for the labour market. *Labour Market Trends* 2003;111:67-76
- Doi, Y., Minowa, M., Tango, T. Impact and correlates of poor sleep quality in Japanese white-collar employees. *Sleep* 2003;26:467-71
- Edington, D. W., Yen, L. T., Witting, P. The financial impact of changes in personal health practices. *J.Occup.Environ.Med.* 1997;39:1037-46
- Emmons, K. M., et al. The working healthy project: a worksite health promotion trial targeting physical activity, diet and smoking *Journal of Occupational and Environmental Medicine* 1999;41(7):545-55
- Erfurt, J. C., et al. The cost-effectiveness of work-site wellness programs for hypertension control, weight loss, and smoking cessation. *J Occup Med.* 1991;33:962–970
- Erfurt, J., et al. Worksite wellness programs: incremental comparisons of screening and referral alone, health education, follow up counselling and plant organization *Am J Health Promot* 1991;5:438-448
- Faragher, E. B., Cass, M. & Cooper, C. L. (2005) The relationship between job satisfaction and health: a meta-analysis. *Occupational Environmental Medicine* 2005, 62, 105-112
- Franche, R. L., et al. Workplace based return to work interventions: A systematic review of the quantitative literature *Journal of Occupational Rehabilitation* 2005;15(4):607-631
- Fries, J. F., et al. Health risk changes with a low-cost individualized health promotion program: effects at up to 30 months. *Am J Health Promo.* 1992;6:364–371
- Fries, J. F. & McShane, D. Reducing need and demand for medical service in high risk persons a health education approach *W J Med* 1998;169:201-207
- Gavin, J. H. & Mason, R. O. (2004). The virtuous organization: The value of happiness in the workplace. *Organizational Dynamics*, Vol 33, No 4, pp.379-392
- Goetzel, R. Z., Anderson, D. R., Whitmer, R. W., Ozminkowski, R. J., Dun, R. L., Wasserman, J. The relationship between modifiable health risks and health care expenditures. An analysis of the multi-employer HERO health risk and cost database. The Health Enhancement Research Organization (HERO) Research Committee. *J.Occup.Environ. Med.* 1998;40:843-54
- Goetzel, R. Z., Jacobson, B. H., Aldana, S. G., Vardell, K., Yee, L. Health care costs of worksite health promotion participants and non-participants. *J.Occup.Environ.Med.* 1998;40:341-6

- Goetzel, R. et al. Association of IBM's A plan for life health promotion program with changes in employees health risk status J Occup Med 1994;36:533-536
- Goetzel, R. Z., et al. Long term impact of Johnson and Johnson's health and wellness program on employee health risks J Occup Environ Med 2002;44:417-424
- Goetzel, R. Z., et al. Health care costs of worksite health promotion participants and non participants. J Occup Environ Med. 1998;40:341-346
- Golaszewski, T., Snow, D., Lynch, W., Yen, L., Solomita, D. A benefit-to-cost analysis of a work-site health promotion program. J.Occup.Med. 1992;34:1164-72
- Golaszewski, T., et al. A benefit-to-cost analysis of a work-site health promotion program. J Occup Med. 1992;34:1164-1172
- The Guardian, www.adinfo-guardian.co.uk/recruitment/research/gradfacts2008/index.shtml, (accessed 2 October 2008)
- Hallet, R., Sutton, S. R. Predicting participation and outcome in four workplace smoking intervention programs. Health Education Research 1987;2:257-66
- Harvey, S., Allaway, S., Glozier, N., Henderson, M., Hotopf, M., Holland-Elliott, K. Investigating the health:performance interface, CHAP/iip, 2007
- Hayes, S. C. (1987) A contextual approach to therapeutic change. In N Jacobson (Ed.) *Psychotherapists in clinical practice*. New York: Guilford Press
- Haynes, G., Dunnagan, T., Smith, V. Do employees participating in voluntary health promotion programs incur lower health care costs? Health Promo Int. 1999;14:43-51
- Headey, B. & Wearing, A. (1989). Personality, life events and subjective wellbeing: toward a dynamic equilibrium model. *Journal of Personality and Social Psychology*, 57, 731-739
- Hemp, P. Presenteeism: at work – but out of it. Harv.Bus.Rev. 2004;82:49-58, 155
- Hennrikus, D. J., et al. The SUCCESS project: the effect of program format and incentives on participation and cessation in worksite smoking cessation programs American Journal of Public Health 2002;92(2):274-9
- Highhouse, S. & Hoffman, J. R. Organizational attraction and job choice. In C. Cooper & I. T. Robertson (Eds), *International Review of Industrial and Organizational Psychology* (pp. 37-64), John Wiley & Sons Ltd: Chichester, 2001
- Hillage, J., et al. Review of the Effectiveness and Cost Effectiveness of Interventions, Strategies, Programmes and Policies to Reduce the Number of Employees Who Move from Short-Term to Long-Term Sickness Absence and to Help Employees on Long-Term Sickness Absence Return to Work, Institute for Employment Studies, 2008
- Hlobil, H., et al. The effects of a graded activity intervention for low back pain in occupational health on sick leave, functional status and pain: 12 month results of a randomised controlled trial Journal of Occupational Rehabilitation 2005;15(4):569-580

Bibliography

- Holzbach, R. L., Piserchia, P. V., McFadden, D. W., Hartwell, T. D., Herrmann, A., Fielding, J. E. Effect of a comprehensive health promotion program on employee attitudes. *J.Occup.Med.* 1990;32:973-8
- Iaffaldno, M. T., Muchinsky, P. M. (1985). Job satisfaction and job performance: a meta-analysis. *Psychological Bulletin* 1985;97:251–73
- Ingersoll, G., Kirsch, J., Merk, S., Lightfoot, J, Relationship of Organisational Culture and Readiness for Change to Employee Commitment to the Organization. Articles. *Journal of Nursing Administration.* 30(1):11-20, 2000
- Johns, G, 'Contemporary research on absence from work: correlates, causes and consequences', in C Cooper and I Robertson (Eds), *International review of industrial and Organisational Psychology*, Vol 12, John Wiley & Sons: Chichester, 1997
- Judge, T. A. & Locke, E. A. (1993). Effects of dysfunctional thought processes on subjective wellbeing and job satisfaction. *Journal of Applied Psychology*, 78, 475-490
- Judge, T. A., Locke, E. A. & Durham, C. C. (1997). The dispositional causes of job satisfaction: A core evaluations approach. In B. M. Staw & L. L. Cummings (Eds), *Research in organisational behaviour* (Vol. 17, pp. 151-188). Greenwich, CT.: JAI Press
- Kellett, K. M., Kellett, D. A., Nordholm, L. A. Effects of an exercise program on sick leave due to back pain. *Phys Ther* 1991;71:283–291
- Kelloway, E. E. & Barling, J. (1991). Job characteristics, role stress and mental health. *Journal of Occupational Psychology*, 64, 291-304
- Kessler, R. C. & Stang, P. E. editors *Health and Work Productivity: Making the Business Case for Quality Health Care*. University of Chicago Press 2006
- Knight, K. K., Goetzel, R. Z., Fielding, J. E., Eisen, M., Jackson, G. W., Kahr, T. Y. et al. An evaluation of Duke University's LIVE FOR LIFE health promotion program on changes in worker absenteeism. *J.Occup.Med.* 1994;36:533-6
- Lechner, L., et al. Effects of an employee fitness program on reduced absenteeism. *J Occup Environ Med.* 1997;39:827–831
- Lowe, G. (2004), *Healthy Workplace Strategies: Creating Change and Achieving Results*. Health Canada: Workplace Health Strategies Bureau
- Marmot, M. *Status Syndrome: How your Social Standing Affects your Health and Life Expectancy*. London: Times Books, 2004
- Marmot, M. (2010), *Fair Society, Healthy Lives: Strategic review of health inequalities in England post 2010*, University College London
- Marsden, D. & Moriconi, S. (2008), *The value of rude health*, London School of Economics
- Meyer, K., et al. Feasibility and results of a randomised pilot-study of a work rehabilitation programme *Journal of Back and Musculoskeletal Rehabilitation* 2005;18(3-4):67-78

- Mikkelsen, A., et al. The impact of a participatory organizational intervention on job characteristics and job stress *Int J Health Services* 1999;29:871-93
- Millar, M. Metropolitan Police saves £30m by managing employee health. *Personnel Today* 25-102005
- Murphy L. *Healthy and Productive Work: An International Perspective*. Taylor and Francis; 2000.
- Murphy, L. R., Hurrell, J. J., Sauter, S. L. & Keita, G. P. (1995). *Job Stress Interventions. Washington, DC: American Psychological Association*
- Musich, S. A., et al. Effectiveness of health promotion programs in moderating medical costs in the USA. *Health Promo Int.* 2000;15:5–15
- Oden, G., et al. Worker productivity, job satisfaction and work-related stress: The influence of an employee fitness program *Fitness Business* 1989;4:198-204
- Ozminkowski, R. J., Dunn, R. L., Goetzel, R. Z., Cantor, R. I., Murnane, J., Harrison, M. A return on investment evaluation of the Citibank, N.A., health management program. *Am.J.Health Promot.* 1999;14:31-43
- Ozminkowski, R. J., et al. Long term impact of Johnson and Johnson's health and wellness program on health care utilization and expenditures *J Occup Environ Med* 2002;44:21-29
- Ozminkowski, R. J., et al. The impact of the Citibank NA health management program on changes in employee health risks over time *J Occup Med* 2000;42(5):502-511
- Palmer, B., Walls, M., Burgess, Z. & Stough, C. Emotional intelligence and effective leadership, *Leadership and Organisation Development*, 22, 1-7, 2002
- Pelletier, B., Boles, M., Lynch, W. Changes in health risks and work productivity. *J Occup Environ Med.* 2004;46:746–754
- Pelletier, K. A Review and Analysis of the Clinical and Cost Effectiveness Studies of Comprehensive Promotion and Disease Management Programs at the Worksite: 1998-2000 Update A *J Health Promot* 2001; 16(2):107-116
- Pelletier, K. R. A review and analysis of the clinical and cost effectiveness studies of comprehensive health promotion and disease management programs at the worksite: Update VI 2000-2004 *JOEM* 2005;47(10):1051-1058
- Pilgrim, H., et al. Modelling the cost effectiveness of interventions, strategies, programmes and policies to reduce the number of employees on sickness absence, 2008
- Poole, K., et al. The impact of an incentive based worksite health promotion program on modifiable health risk factors *Am J Health Promot* 2001;16:21-26
- Proper, K. I., et al. Costs, benefits and effectiveness of worksite physical activity counselling from the employer's perspective. *Scandinavian Journal of Work, Environment, and Health*, 2004, 30(1):3646

Bibliography

- PWC, Building the Case for Wellness, February 2008
- Quick, J. C., Quick, J. D., Nelson, D. L. & Hurrell, J. J. (1997). Preventative stress management in organisations. *Washington DC: American Psychological Association*
- Ricci, J. & Chee, E. Lost productive time associated with excess weight in the US workforce, *Journal of Occupational and Environmental Medicine*, 47 (10), 1227-1234, 2005
- Rick, J., et al. Review of the Effectiveness and Cost Effectiveness of Interventions, Strategies, Programmes and Policies to Reduce the Number of Employees Who Take Long-Term Sickness Absence on a Recurring Basis May 2008
- Robertson, I. (2007). Using Business psychology to close the wellbeing gap. *Selection and Development Review*, Vol. 23, No. 4
- Rucci, A. J., Kim, S., Quinn, R. T. 'The employee-customer-profit chain at Sears', *Harvard Business Review*, Jan-Feb, pp. 83-97, 1998
- Sainsbury Centre for Mental Health, Mental Health at Work: Developing the Business Case, London: SCM, Policy Paper 8, 2007
- Saunders, T., Driskell, J. E., Johnston, J. H. & Salas, E. (1996). The effects of stress inoculation training on anxiety and performance. *Journal of Occupational Health Psychology* 1, 170-186
- Schultz, A. L. C., Barnett, T., et al. Influence of participation in a worksite health promotion program on disability days. *J Occup Environ Med*. 2002;44:776-780
- Schwab, D. P., Rynes, S. L. & Aldag, R. J. Theories and research on job search and choice. *Research in Personnel and Human Resources Management*, 5, 129-166, 1987
- Seidlitz, L. & Diener, E. (1993). Memory for positive versus negative events: Theories for the differences between happy and unhappy persons. *Journal of Personality and Social Psychology*, 64, 654-664
- Seidlitz, L., Wyer, R. S. & Diener, E. (1997). Cognitive correlates of subjective wellbeing: the processing of valenced life events by happy and unhappy persons. *Journal of Research in Personality*, 31, 240-256
- Serxner, S. A., Gold, D. B., Bultman, K. K. The impact of behavioral health risks on worker absenteeism. *J.Occup.Environ.Med*. 2001;43:347-54
- Shephard, R. J. Twelve years experience of a fitness program for the salaried employees of a Toronto Life Assurance Company. *Am J Health Promo*. 1992;6:292-301
- Simon, G. E., Revicki, D., Heiligenstein, J., et al.(2000) Recovery from depression, work productivity, and health care costs among primary care patients. *Gen Hosp Psychiatry*. 22:pp153-162
- Soubbotina, T. P., Sheram, K. A. Growth of the service sector. *Beyond Economic Growth: Meeting the challenges of global development*, pp 50-4. Washington DC: The World Bank, 2000

- Sperry, L. (1991). Enhancing Corporate Health, Mental Health and Productivity. *Individual Psychology*, 47:2 (1991, June) p.247
- Staw, B. M., Sutton, R. I. & Pelled, L. H. (1994) Employee positive emotion and favourable outcomes at the workplace. *Organisation Science*, 5, 52-71
- Staw, B. M. & Barsade, S. G. (1993). Affect and managerial performance: A test of the sadder-but-wiser vs. happier-and-smarter hypotheses. *Administrative Science Quarterly*, 38, 304-331
- Steel, R. P. & Rentsch, J. R. (1997). The dispositional model of job attitudes revisited: Findings of a 10-year longitudinal study. *Journal of Applied Psychology*, 82, 873-879
- Steenstra, I. A., et al. (2006), Economic evaluation of a multi-stage return to work program for workers on sick leave due to low back pain *Journal of Occupational Rehabilitation*, 16(4):557-578
- Tompa, E., et al. (2008), A Systematic Review of Disability Management Interventions with Economic Evaluations *J Occup Rehabil*, 18: 16-26
- Tsai, S. P., Wendt, J. K., Ahmed, F. S., Donnelly, R. P., Strawmyer, T. R. (2005). Illness absence patterns among employees in a petrochemical facility: Impact of selected health risk factors. *J.Occup.Environ.Med.*;47: 838-46
- Tscharnetzki, O. (2008), Presenteeism: Business Case & Missing Link, Unilever EfH Management Conference, October 2008
- Turban, D. B. and Greening, D. W. (1996), Corporate social performance and organisational attractiveness to prospective employees. *Academy of Management Journal*, 40 (3), 658-672
- Turner, N. & Barling, J. (200), Moral reasoning and transformational leadership: an exploratory study, School of Business, Queen's University, Kingston, Ontario
- Vaughan-Jones, H. & Barham, L. (2009). *Healthy Work: Challenges and Opportunities to 2030*. London: Bupa
- Waddell, G., & Burton, A. K. (2006), *Is work good for your health and wellbeing?* London: Department of Work and Pensions
- Wadsworth, E., Simpson, S., Moss, S. & Smith, A. (2003), The Bristol Stress and Health Study: accidents, minor injuries and cognitive failures at work, *Occupational Medicine* 53:392-397
- Warr, P. (1987). *Work, Unemployment and Mental Health*. New York: Oxford University Press
- Warr, P. (1990). The measurement of wellbeing and other aspects of mental health. *Journal of Occupational Psychology*, 63, 193-210
- Wright, D., Adams, L., Beard, M. J., Burton, W. N., Hirschland, D., McDonald, T., et al. Comparing excess costs across multiple corporate populations. *J.Occup.Environ.Med.* 2004;46:937-45

Bibliography

- Wright, D. W., Beard, M. J., Edington, D. W. Association of health risks with the cost of time away from work. *J.Occup.Environ.Med.* 2002;44:1126-34
- Wright, Thomas, A., Bonett, Douglas, G. & Sweeney, Dennis, A. (1993) Mental Health and Work Performance: Results of a Longitudinal Study *Journal of Occupational and Organisational Psychology* 66, 277-284
- Yen, L. T., Edington, D. W., Witting, P. Associations between health risk appraisal scores and employee medical claims costs in a manufacturing company. *Am.J.Health Promotion.* 1991;6:46-54

Contact details

Prepared for:

Rob Hargreaves
Investors in People
7-10 Chandos Street
London
WG1 9DQ

Tel: 020 7467 1923

robh@iipuk.co.uk

Prepared by:

Stephen Bevan
The Work Foundation
21 Palmer Street
London
SW1H 0AD

Tel: 020 7976 3612

sbevan@theworkfoundation.com

All rights reserved. No part of this publication may be reproduced, stored in a retrieval system or transmitted, in any form or by any means, electronic, mechanical, photocopying, recording and/or otherwise without the prior written permission of the publishers. This publication may not be lent, resold, hired out or otherwise disposed of by way of trade in any form, binding or cover other than that in which it is published, without the prior consent of the publishers.

We provide:

Research

Advisory Consulting

Policy and Voice

Partnership

The Work Foundation is the leading independent authority on work and its future. It aims to improve the quality of working life and the effectiveness of organisations by equipping leaders, policymakers and opinion-formers with evidence, advice, new thinking and networks.

© The Work Foundation

Registered as a charity no: 290003

First published: April 2010

The Work Foundation
21 Palmer Street
London
SW1H 0AD

Telephone: 020 7976 3519

Website: www.theworkfoundation.com