



The Sainsbury Centre for Mental Health works to improve the quality of life for people with mental health problems by influencing policy and practice in mental health and related services.

We now focus on criminal justice and employment, with supporting work on broader mental health and public policy.

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Mental Health at Work: Developing the business case

Summary

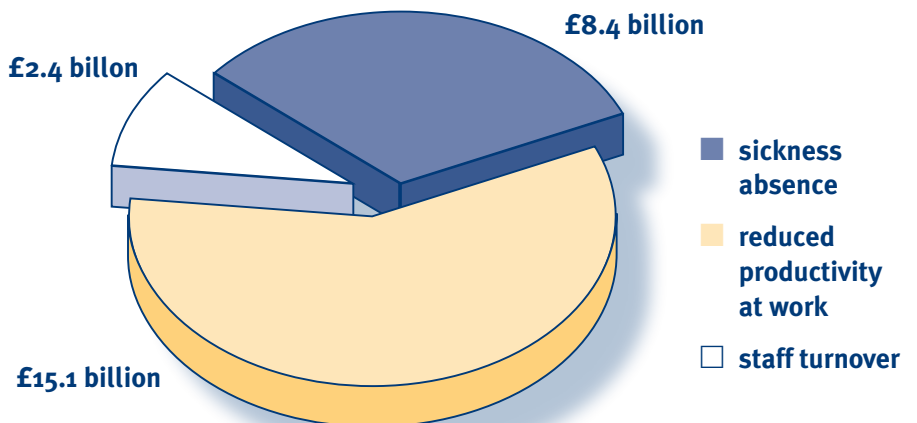
Every organisation in Britain is affected by mental distress and ill health in the workforce. At any one time one worker in six will be experiencing depression, anxiety or problems relating to stress. Mental ill health is normal in every workplace in the land.

The total cost to employers of mental health problems among their staff is estimated at nearly £26 billion each year. That is equivalent to £1,035 for every employee in the UK workforce.

The business costs of mental ill health are shown in Figure 1. They comprise:

- £8.4 billion a year in sickness absence. The average employee takes seven days off sick each year of which 40 per cent are for mental health problems. This adds up to 70 million lost working days a year, including one in seven directly caused by a person's work or working conditions.
- £15.1 billion a year in reduced productivity at work. 'Presenteeism' accounts for 1.5 times as much working time lost as absenteeism and costs more to employers because it is more common among higher-paid staff.
- £2.4 billion a year in replacing staff who leave their jobs because of mental ill health.

Figure 1: The business costs of mental ill health at work



Simple steps to improve the management of mental health in the workplace, including prevention and early identification of problems, should enable employers to save 30 per cent or more of these costs – at least £8 billion a year.

Taking action to promote mental wellbeing among staff, to give better help to those experiencing distress and to support those who need time off to come back to work makes business sense. The cost of neglecting mental distress at work is simply too high to be ignored any longer.

Introduction

This paper discusses the importance to employers of mental health problems in the workforce. Drawing on UK and international evidence, it seeks to identify all the key effects of mental ill health and stress at work and, wherever possible, to quantify these in financial terms. We aim to demonstrate why mental health is important to all employers – as a business matter. The evidence indicates that better management of mental health at work makes good business sense, because of the substantial costs that are potentially avoidable through effective action.

There are a number of reasons for supposing that mental health problems in the workforce are more important and more costly to employers than most realise. For example:

- Survey evidence indicates that the great majority of employers seriously underestimate the prevalence of mental health problems among their employees. Nearly half think that none of their staff will ever have a mental health problem: in fact the rate is at least one in six at any time.
- The importance of mental ill health as a cause of sickness absence from work is generally acknowledged but it is not always accurately measured.
- Much less is known about the importance of mental health problems as a cause of impaired performance while people are at work. The evidence that is available suggests that ‘presenteeism’, as it has now come to be known, has a significantly larger impact on worker productivity than absenteeism.
- Mental health problems in the workforce have other adverse consequences for organisations, such as increased staff turnover, which again are not always well recognised or recorded.
- Depression, anxiety and stress can contribute to the development of a range of physical illnesses, including serious conditions such as coronary heart disease. The work-related costs of mental ill health may be understated unless allowance is made for these wider health effects.
- Costs may also be understated if a fear of discrimination or even dismissal leads employees to disguise mental health problems and to blame absence or under-performance on ill-defined physical symptoms.

This paper aims to increase knowledge and awareness among employers concerning the scale of mental health problems at work and

their implications for business, leading in turn to the development of better policies for the management of mental health in the workplace. The first part of the paper sets out the costs in brief. The latter sections show the detailed calculations we made to arrive at these figures and the references for the statistics cited.

The costs of mental ill health at work

The extent of mental ill health in the UK workforce

A broad definition of mental health problems is followed here, in line with the coverage of official surveys. This includes both severe and enduring conditions such as schizophrenia and bipolar disorder, found among less than 1 in 100 people of working age, and less severe but much more common conditions such as depression and anxiety.

On this basis, the evidence shows that most people with mental health problems are in paid employment and are almost as likely to be working as anybody else. The prevalence of mental health problems in the workforce is not much different from that in the population at large. As in the wider community, many of these problems are undiagnosed and untreated.

On average, employers should expect to find that at any one time nearly 1 in 6 of their workforce is affected by a mental health condition such as depression or anxiety. The proportion rises to over 1 in 5 if alcohol and drug dependence are also included.

These high rates of prevalence are not well recognised by employers. In a recent survey of senior managers, nearly half thought that *none* of their workers would ever suffer from a mental health problem during their working life and over two-thirds put the rate at less than 1 in 20.

Sickness absence

On average, employees take 7 days off work a year for health reasons. It is estimated that mental health problems account for 40 per cent of this figure, or 2.8 days a year.

In aggregate this amounts to 70 million working days lost each year. By way of comparison, about

0.7 million days have been lost in each of the last two years because of industrial action.

Of the 70 million days lost each year for mental health reasons, about 10 million are lost because of anxiety, depression and stress which employees say is directly caused by their work or working conditions. Work-related mental ill health accounts for more days lost than any other cause of work-related illness.

According to surveys published by the CBI and CIPD, the cost of sickness absence is estimated by companies at £75-80 a day on average. However, a range of evidence suggests that this figure is a significant under-estimate. Management systems for recording, analysing and costing sickness absence are not well developed in many organisations.

Using an adjusted estimate of £120 for the daily cost, the total cost of sickness absence attributable to mental health problems is put at £335 a year for every employee in the UK workforce. This is equivalent to an overall cost to employers at the national level of £8.4 billion a year.

The cost of sickness absence resulting from mental health problems that are directly work-related is estimated at £1.26 billion a year at the national level, equivalent to a cost of £50 per average employee.

Reduced productivity at work

Presenteeism is defined as the loss in productivity that occurs when employees come to work but function at less than full capacity because of ill health. Measurement is difficult, but accumulating international evidence suggests that such losses in on-the-job productivity may be several times larger than the losses caused by sickness absence.

Presenteeism is particularly important in the case of mental ill health. Among other reasons, this is because workers may be concerned about being labelled as mentally ill by their employers and co-workers. Fearing possible stigma or discrimination, they may turn up for work even if feeling unwell.

Evidence from Australia suggests that productivity losses related to mental ill health are particularly likely to take the form of presenteeism (rather than absenteeism) among white-collar workers, including those in executive and professional groups.

Research on the scale and cost of presenteeism is a relatively new subject and published work is largely US-based, although some studies have also been undertaken in Canada and Australia. Drawing on the international evidence and adapting it to the UK context, it is conservatively estimated that in the UK presenteeism attributable to mental health problems accounts for 1.5 times as much working time lost as absenteeism.

The average cost of presenteeism is put at around £145 per working day lost, corresponding to the average gross daily compensation of employees in the UK economy. This is higher than the corresponding cost of absenteeism, mainly because the inverse association that is commonly found between earnings and rates of sickness absence (that lower-paid workers take more time off work than higher-paid workers) does not apply in the case of presenteeism.

On this basis, it is estimated that the annual costs of presenteeism attributable to mental health problems amount to £605 for every employee in the UK workforce, or £15.1 billion in total.

Staff turnover

Survey data indicate that the average annual rate of staff turnover in employing organisations in the UK is around 16 per cent, implying that over four million jobs change hands each year. Such limited evidence as is available suggests that, while not a major cause of turnover, mental health problems including stress might account for up to five per cent of the total.

Turnover can have positive as well as negative effects, but some costs are always incurred when employees leave organisations and over 70 per cent of employers report an adverse effect on business performance.

The average cost to employers of a job change, including the cost of recruiting, selecting and training a replacement worker, is estimated at £11,625. This is equivalent to about 40 per cent of average gross pay, towards the lower end of a range suggested by international evidence.

Taken together, these figures imply that staff turnover attributable to mental health problems has an aggregate cost to employers of up to £2.4 billion a year or, spread over the whole workforce, a cost per average employee of £95 a year.

Table 1: Overall costs to employers

	Cost per average employee £	Total cost to UK employers £ billion	Per cent of total %
Absenteeism	335	8.4	32.4
Presenteeism	605	15.1	58.4
Turnover	95	2.4	9.2
Total	1,035	25.9	100.0

Overall costs to employers

Bringing together the figures for absenteeism, presenteeism and staff turnover, quantifiable costs falling on employers because of mental health problems in the UK workforce in 2006 are shown in Table 1.

Overall costs are thus estimated at £1,035 a year for every employee in the workforce, or £25.9 billion at the aggregate level. This is equivalent to 3.6 per cent of the national pay bill. Presenteeism is reckoned to be the largest single element of cost, accounting for nearly three-fifths of the total.

The figures imply that a small organisation employing 50 workers will typically incur costs of around £50,000 a year because of mental health problems among its employees. At the other end of the scale the country’s biggest employer – the NHS, with around 1.3 million workers – will face annual costs of over £1.3 billion (equivalent to about a quarter of the entire NHS mental health service budget).

Average costs per manual worker are estimated at around £850 a year (equivalent to 4.3 per cent of total pay), while average costs per non-manual worker are put at around £1,125 a year (equivalent to 3.3 per cent of total pay).

Some other costs can be identified but not easily quantified, although they may be important in particular cases. For example, shortcomings in the management of stress and mental health at work may give rise to risks of legal action under health and safety legislation and may also damage a company’s reputation, among both employees and customers.

There is good evidence that mental ill health, including stress, serves as a risk factor for a range of physical health conditions including heart disease, stroke, cancer, diabetes and asthma. The impact on a person’s life is also significantly worse when physical illness is accompanied by mental ill health, compared with physical illness on its

own. Measures aimed at reducing the prevalence of mental health problems in the workforce will therefore yield indirect benefits via the effects on physical health, as well as the direct gains in productivity resulting from better mental health.

Finally, in addition to its identifiable impact on individual organisations, mental ill health has certain wider consequences affecting the business community as a whole. One of these is its adverse effect on the overall supply of labour, with about 1 million people with mental health problems claiming long-term Incapacity Benefit and a further 0.5 million claiming shorter-term unemployment benefits. Another is the effect of mental ill health on the overall level of taxation in the economy, which is broadly estimated at around £35 billion a year in the UK, taking into account tax-funded public spending on mental health services and also tax losses resulting from the adverse effects of mental health problems on employment and output. The estimate of £35 billion is equivalent to more than three-quarters of the total yield of corporation tax.

The implications for employers

The scale of costs associated with mental health problems in the workforce is considerable. One way of interpreting these figures is as a measure of the potential benefits to be derived from the better management of mental health problems at work, on the logic that a cost saved or averted is a benefit gained. Specific interventions aimed at improving mental health in the workplace must of course be justified in their own right, but the evidence of this study gives a clear indication of the potential financial benefits to organisations in terms of their overall scale.

The key questions an employer would want answered would include:

What proportion of costs can realistically be saved?

Some evidence is available from the results of mental health programmes pursued by large organisations such as BT, the Royal Mail Group, Astra Zeneca and Rolls Royce. For example, BT has reported that its mental wellbeing strategy has led to a reduction of 30 per cent in mental health-related sickness absence and a return to work rate of 75 per cent for people absent for more than six months with mental health problems (Wilson, 2007). If all employers could achieve the same reduction in sickness absence, with equivalent reductions in presenteeism and turnover, it can be calculated that the overall savings would come to over £300 a year for every employee in the workforce, or nearly £8 billion a year at the national level.

Does action to achieve these savings make good business sense?

Published research provides positive evidence on the financial returns from health management programmes. For example, the results of an Australian programme of early diagnosis and intervention for employees with depressive symptoms indicate annual financial benefits in terms of higher productivity which are nearly five times the annual costs of the programme (Hilton, 2005). A similar programme in the US shows annual financial benefits of \$1,800 per employee compared with costs of only \$100 – \$400 a year (Wang *et al.*, 2007).

How can the savings be delivered?

Evidence suggests that the key components of an effective work-based programme are:

- **Recognition** by employers that work is on the whole very good for mental health, as it is for physical health (Waddell & Burton, 2006).
- **Prevention** of mental health problems which are directly work-related (accounting for around 15 per cent of total costs). This may include providing mentally healthy working conditions and practices in line with the Health and Safety Executive's management standards on work-related stress.
- **Awareness training** for line managers, to increase their knowledge and understanding of mental health issues and their ability to respond confidently and in a timely fashion to employees in distress.

- **Better access to help**, particularly access to evidence-based psychological help which wherever possible enables people to carry on working at the same time as receiving support.
- **Effective rehabilitation** for those who need to take time off work, including regular contact with the employee during periods of absence.

More detailed information and guidance for employers on the management of mental health at work is being produced by the Sainsbury Centre for Mental Health as part of its continuing work programme on mental health and employment.

How the costs were calculated

The remaining sections of this paper show in more detail how we have calculated the figures shown.

The extent of mental ill health in the workforce

Although slightly dated, the most comprehensive source of information on the prevalence of mental health problems among people of working age is a study of adult psychiatric morbidity carried out by the Office for National Statistics (ONS) in 2000 (Singleton *et al.*, 2001; Meltzer *et al.*, 2002). This is a large-scale survey, covering a representative sample of over 8,000 adults aged 16-74 years living in private households in Great Britain, and it provides estimates of prevalence rates for all major forms of mental ill health by diagnostic category. These include: common mental health problems such as depression and anxiety (described in the ONS survey as neurotic disorders); more serious and enduring conditions such as schizophrenia (psychotic disorders); and also alcohol and drug dependence. The ONS survey does not include stress as a separate diagnostic category and it is therefore covered only to the extent that it makes a causal contribution to recognised and clinically diagnosable conditions such as depression. Information collected in the survey allows prevalence rates for these conditions to be analysed according to a wide range of demographic and socio-economic variables, including employment status.

The survey shows that, among the adult population as a whole, nearly 1 in 4 (23.4 per cent) is suffering at any particular time from one or more of the conditions described above. Most of these

are common mental health problems such as depression and anxiety (the overall prevalence rate for these is 17.6 per cent), and nearly all the remainder are accounted for by alcohol and drug dependence. The prevalence of severe and enduring mental illness is less than 1 in 100.

There is a popular misconception that most people with mental health problems do not work. It is certainly the case that mental ill health is an important cause of work-related disability, accounting for nearly 40 per cent of all claims for Incapacity Benefit, the social security benefit which is paid to people who are unable to work because of long-term ill health (Department for Work and Pensions, 2006). However, the ONS survey shows that in fact the majority of working-age people with mental health problems are in paid employment. (As will be seen, many of these problems are undiagnosed and untreated.) It follows from this that the high rates of prevalence for mental ill health found in the adult population generally are also found among people in work. Mental health problems are almost as common in the workplace as they are anywhere else.

The ONS survey shows that, among all adults aged 16-74, 67 per cent are in work, including 49 per cent working full time and 18 per cent part time. The corresponding figures among those with any kind of mental health problem are not very different: 63 per cent in work, including 47 per cent full time and 16 per cent part time. In other words, contrary to popular belief, people with mental health problems are almost as likely to be working as anybody else.

Employment rates among people with mental health problems do, however, vary substantially by type of diagnosis. Only a small minority – about a quarter – of those with a probable psychotic disorder are in work and most of those do so part time. Conversely, the employment rate among people with alcohol dependence is significantly higher than average, with 75 per cent working, including 62 per cent full time. The proportion of working-age adults with common mental health problems (depression, anxiety etc) who are employed is 57 per cent, including 40 per cent working full time and 17 per cent part time.

The ONS study shows that 22.3 per cent of all people in paid employment have some kind of mental health problem as defined in the survey. This is not far short of the prevalence rate of 23.4 per cent which applies to the adult population as a whole. As noted, the figures include alcohol and drug dependence, conditions which may not always feature in popular or lay definitions

of mental ill health. Even omitting these cases, the ONS survey indicates a prevalence rate of 15.4 per cent for mental health problems among people in work. In other words, employers should expect to find on average that nearly 1 in 6 of their workforce is affected by depression, anxiety or other mental health condition to a clinically diagnosable degree, or around 1 in 5 if alcohol and drug dependence are also included.

Employer perceptions of prevalence

These high rates of prevalence do not appear to be well recognised by employers. A recent survey of 550 senior managers was commissioned by the Shaw Trust on how British business perceives mental health in the workplace (Shaw Trust, 2006). The survey included the question: “What percentage of employees do you think will have a mental health problem at some point during their working life?” Despite the fact that *at any one time* 15.4 per cent of people in work have a recognised mental health problem, only 1 in 5 of the managers interviewed thought the *lifetime* risk was 15 per cent or more. To put this into context, some US evidence suggests that the chance of having mental health problems over a lifetime may be nearly twice as high as the rate at any particular point in time (Kessler *et al.*, 2005).

At the other end of the scale, nearly half of employers thought that *none* of their workers would suffer from a mental health problem during their working life and over two-thirds put the relevant figure in the range 0 – 5 per cent. Even among the HR directors interviewed in the survey, nearly half thought that five per cent or less of the workforce would ever be affected by a mental health problem. As the report by the Shaw Trust notes, such figures suggest “an amazingly low level of true understanding on the part of senior executives” about the scale of mental health problems in the workforce. The under-estimation was particularly marked among the heads of small businesses.

One important reason for this lack of knowledge is that in many cases clinically diagnosable mental health problems are not recognised or acknowledged as such even by the individuals directly affected. For example, the ONS survey of adult psychiatric morbidity found that only a small minority of those assessed as suffering from mental ill health were seeking or receiving any kind of treatment for their condition. Thus among people with neurotic disorders (anxiety, depression etc), fewer than a quarter (24 per cent) were currently receiving any form of treatment,

whether medication or talking therapy, and fewer than two-fifths (39 per cent) had spoken to their GP about a mental or emotional problem at any time during the last year. Among those classified as alcohol- or drug-dependent, the numbers currently receiving treatment were even lower, at 10 per cent and 13 per cent respectively.

Failure to seek treatment may have a number of explanations, including doubts about the availability or effectiveness of possible interventions, but it seems clear that an inability or unwillingness to acknowledge a clinically diagnosable mental health problem by those affected is at least part of the story. Some evidence for this is provided by a major study of depression in the workplace currently being carried out in Australia, the WORC (Work Outcomes Research and Cost-benefit) project (Hilton, 2007). Based on a large-scale survey of employees, the study estimates that the prevalence of depression is 6.7 per cent among people working full time. Those with depressive symptoms were asked about treatment-seeking behaviour. The replies for full-time employees are shown in Figure 2.

Figure 2 shows that fewer than a quarter of those with depression are currently receiving treatment and that there is a large group of people with clinically diagnosable symptoms who do not admit to having any condition, accounting for over a third of those not currently being treated. Such evidence confirms that a significant proportion of mental ill health in the workforce is undiagnosed and untreated.

Sickness absence

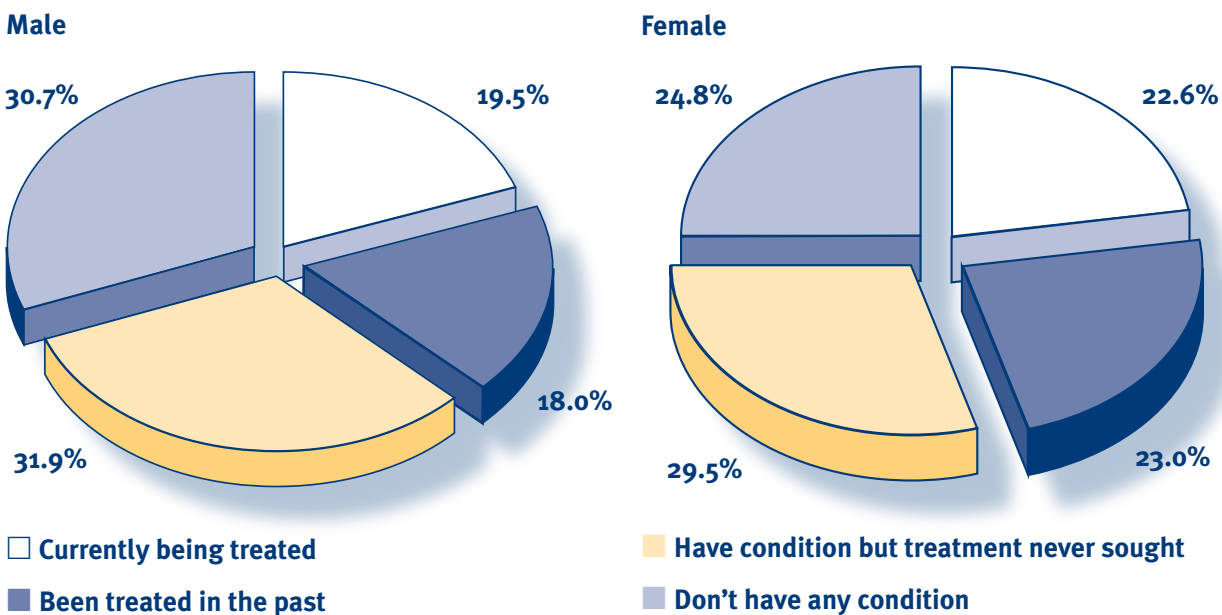
Mental health problems as a cause of sickness absence

Various sources of data are available on health-related absences from work. These include:

- Regular employer-based surveys of absence carried out by the Confederation of British Industry (CBI in association with AXA, 2007) and by the Chartered Institute of Personnel and Development (CIPD, 2007a)
- A large employee-based survey of sickness absence undertaken in 2005 by the Health and Safety Executive (Health and Safety Executive, 2005)
- The ONS survey of psychiatric morbidity, which contains some data on sickness absence generally as well as absence specifically relating to mental ill health.

Each of these sources has its own strengths and weaknesses. For example, the CBI and CIPD surveys have the advantage of relying on management records for their information and these may be considered more reliable than the data in the HSE and ONS studies, which depend on the ability of individuals to recall accurately all days taken off work during a preceding year. On the other hand, response rates to the CBI and CIPD surveys are very low, raising questions about their representativeness, and there are also concerns about the quality of data recording in the management systems of some organisations

Figure 2: Treatment-seeking among men and women with depression

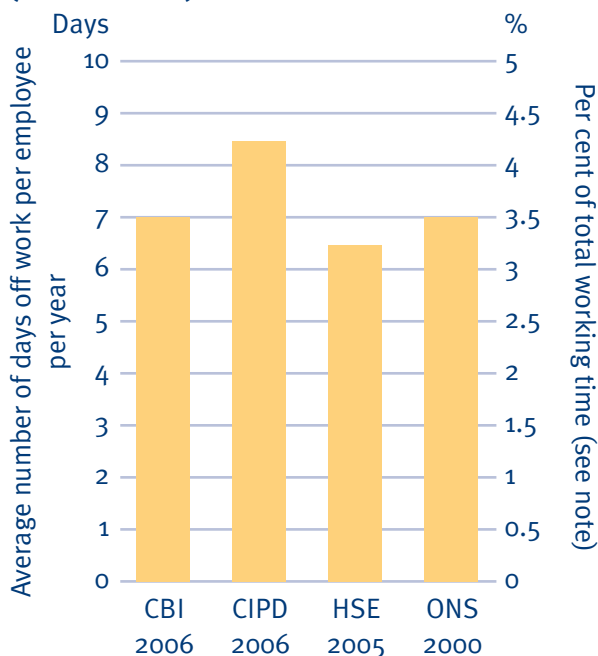


(from Hilton, 2007)

(Bevan, 2003). No single source can therefore be considered wholly reliable.

The estimates they make of the scale of sickness absence for all health conditions combined is shown in Figure 3.

Figure 3: Estimates of sickness absence (for all causes)



Note: it is assumed that, on average, full-time employees work 228 days a year (5 days a week for 52 weeks, less 32 days for paid leave and public holidays). It is also assumed that part-time employees, who account for 25 per cent of the workforce (Office for National Statistics, 2007a), work for half this amount of time, i.e. 114 days a year. Taken together, these assumptions imply a working year of 200 days averaged over the employed population as a whole.

Reassuringly, the estimates in the various sources cited above are broadly similar. A broad average of the four surveys is seven days off work a year per employee and this will be used as a baseline figure in what follows.

The next step is to estimate the proportion of all health-related absence that can be attributed specifically to mental ill health. The ONS survey indicates that employed people with mental health problems account for 44.6 per cent of all days off work, while the CBI quote a figure of 36 per cent for the proportion of all sickness absence that can be attributed to mental health conditions. There are various possible reasons for this difference, the most important being that the ONS figure includes all time off work taken by people with mental health conditions, including absence because of co-existing physical health conditions. In the CBI estimate this is attributed

directly to the physical conditions concerned. To the extent that mental ill health may have a direct causal influence on physical health, it is open to debate which of these two methods of estimation is the more appropriate. There are also differences between the two sources in coverage and definition, for example regarding the treatment of alcohol and drug dependence. Finally, it should be noted that the ONS figure may understate absence attributable to mental health problems, as it is based on the amount of time off work taken during the previous 12 months by people *currently* assessed as having a mental health problem and will therefore exclude mental health-related absences taken earlier in the year by people no longer in this category.

In the absence of more detailed information, use is made here of a mid-point figure of 40 per cent for the proportion of all time off work that is attributable to mental health problems. Set against a baseline figure of seven days a year for total health-related sickness absence, this is equivalent to 2.8 days off work each year per average employee, or 1.4 per cent of total working time. At the aggregate level, as the overall number of employees in the UK economy (excluding self-employed people) is currently 25.0 million (Office for National Statistics, 2007a), the estimate implies that 70 million working days are lost each year because of sickness absence attributable to mental health problems. By way of comparison, 765,000 working days were lost in the UK because of industrial action in the 12 months to July 2006 and 606,000 in the 12 months to July 2007 (Office for National Statistics, 2007a).

The ONS survey shows that 30 per cent of all employed people took some time off work for health reasons during the previous year. The proportion was significantly higher for people with mental health problems, at 43 per cent among those with any form of mental ill health (including alcohol and drug dependence), rising to 48 per cent among those with depression, anxiety or other common mental health problem. In addition, people with mental health problems who took sickness absence did so for more time during the year than the average in the working population as a whole.

Among all people taking time off work for health reasons, the average amount of absence was 23 days in the year, whereas the average among those with mental health problems was 33 days, rising to 40 days among those with depression, anxiety etc. Taken together, these findings imply that, on average, those in work with any kind of

mental health problem take twice as much time off work for health reasons as employed people generally (14 days a year against an average of 7 days), while those with depression and anxiety take an average of 19 days off work.

As just noted, sickness absence among those with mental health problems who take some time off work for health reasons is 33 days over the year. Separate data published by the CIPD shows that each individual spell of absence that is attributable to mental health problems lasts 21 days on average (Spurgeon *et al.*, 2007). The higher figure in the ONS survey implies that a substantial proportion of all those taking time off work for mental health reasons have more than one spell of absence during the year. The CIPD data also suggest that, with a 21 day average, individual spells of absence caused by mental health problems typically last longer than those resulting from other health conditions, given that 70 per cent of total time off work is accounted for by spells of absence lasting less than 8 days.

The costs of sickness absence

Both the CIPD and the CBI surveys include estimates of the costs of sickness absence, based on the replies given by responding organisations. The most recently published surveys yield very similar figures for the estimated unit (daily) cost of sickness absence. The 2007 CIPD survey reports an average of 8.4 days off work per employee (all health conditions) at a cost to employers of £659, implying a cost per day of £78.45. In comparison, the CBI gives a lower number of days off work at 7.0 per employee but at a correspondingly lower cost to employers of £537, yielding a virtually identical cost per day of £76.71.

Both these estimates relate to the direct costs of sickness absence, mainly the salary costs of absent employees and replacement costs (e.g. temporary staff or additional overtime). In the CBI survey, respondents were also asked to provide, if possible, an estimate of the indirect costs of absence, such as those arising from lower customer satisfaction. The report of the 2007 survey notes that very few respondents were able to provide such an estimate, but those who did reported an additional cost of £270 per employee a year. This is equivalent to an extra £38.57 on the daily cost of absence, giving a total daily cost of £115.28, covering both direct and indirect costs.

While the CBI and CIPD surveys give very similar figures for the direct cost of sickness absence, a

number of qualifications should be noted. First, the estimates are based on very small sample numbers. For example, only 203 organisations provided any information on costs in the CIPD survey, representing less than a quarter of all those who responded to the questionnaire. Second, little information is provided on how the figures are calculated. And third, it is worth noting the finding of a report on sickness absence by the Institute of Employment Studies (IES) that “most UK employers are seriously under-estimating the costs of sickness absence” (Bevan & Hayday, 2001).

In the light of these concerns, an alternative estimate has been made of the daily cost of absence, for comparison with the CIPD and CBI estimates. This starts from the conventional assumption that sickness absence entails a loss of output whose value in a competitive labour market equals the money wage (or, more accurately, total compensation per employee, i.e. the money wage plus on-costs such as national insurance contributions).

The national accounts show that the total compensation of all employees in the UK in 2006 amounted to £721.3 billion (Office for National Statistics, 2007b). Set against an employee workforce of 25.0 million, this implies that average compensation per employee was £28,850. In turn, for an average working year of 200 days as estimated earlier, gross average compensation per day works out at £144.25.

A number of adjustments are needed to turn this broad average into a representative figure for the cost of a day’s sickness absence.

First, the research literature on absenteeism suggests that employee compensation is likely to set a lower limit to the value of lost output resulting from a day of missed work (Pauly *et al.*, 2002; Nicholson *et al.*, 2006). Increasing numbers of workers operate in teams, in which the input of each member affects the productivity of all the other members in a complementary fashion, so that the absence of one disproportionately reduces total output. Many workers now have specialised skills or knowledge which cannot easily be replaced in full by a temporary substitute. And much output in the modern economy is time sensitive, in the sense that price or revenue will fall if production is lost or delayed.

Building on these considerations, a recent study in the US has estimated the mark-up of lost output from a day’s absence for 35 different jobs in a representative range of industries and found

the average to be an extra 28 per cent over the absent worker's daily wage (Nicholson *et al.*, 2006). On the assumption that this estimate is broadly applicable to the UK workforce, the cost of a day's absence based on average compensation per employee should also be increased by 28 per cent, to around £185.

The second adjustment goes the other way and is based on the finding consistently reported in UK absence surveys that rates of sickness absence tend to vary inversely with earnings. The cost of absence will therefore be overstated if based on a national average for employee compensation. In particular, absence rates are 58 per cent higher among manual workers than among non-manual workers (CIPD, 2007a) and also 33 per cent higher among female employees than among male employees (Health and Safety Executive, 2005). The average cost of a day's absence, after making adjustments for these two factors based on published earnings data (Office for National Statistics, 2007c), needs to be reduced from £185 to £160.

Finally, the use of average employee compensation will also overstate the cost of absence to employers, to the extent that some of the cost is borne by employees in the form of lower pay during periods of time off work. The 2007 CIPD survey of absence shows that almost 90 per cent of all employers provide occupational sick pay at the same level as employees' full wage or salary, which suggests that in practice nearly all the cost of absence falls on employers. However, about a quarter of employers use waiting days before sick pay is payable, about half only provide access to their sick pay schemes once employees have accrued a qualifying length of service (6 months on average), and the average time that occupational sick pay is paid at full rate is typically around 15 weeks, with lower rates being paid for long-term absences. Detailed data is lacking for a precise quantification of these effects, but a broad estimate is that, overall, around 25 per cent of the costs of sickness absence are borne by employees in the form of reduced pay. Taking this into account, the cost of sickness absence to employers based on adjusted employee compensation is therefore estimated at £120 a day in round terms.

While subject to a number of qualifications, this figure does suggest that the CIPD and CBI estimates based on direct costs are too low. The revised figure is, however, very similar to the CBI estimate of £115 covering both direct and indirect costs.

Using a daily cost of £120, the cost of sickness absence attributable to mental health problems is estimated at £335 a year for every employee in the UK workforce, equivalent to an overall cost to employers at the national level of £8.4 billion.

Work-related ill health as a cause of sickness absence

Ill health, including mental ill health, has a wide variety of causes, but particular interest may attach to illnesses that are work-related. Such conditions should in principle be preventable by effective management action, including the provision of better working conditions.

The main source of statistical information on this topic is an annual survey of Self-Reported Work-Related Illness (SWI) carried out by the Health and Safety Executive (HSE, 2007). This is undertaken as part of the Labour Force Survey, a large representative survey of the UK working population, and, as its title indicates, collects self-report data on ill health. The latest published version of the survey relates to 2005/06 and shows that in that year 24.3 million days were lost because of work-related ill health (all conditions), representing about 1 in 7 of all days lost for health reasons.

Work-related mental ill health, defined in the survey as anxiety, depression and stress, accounted for 10.5 million working days lost in 2005/06, making this the largest single cause of absence attributable to work-related illness at 43.3 per cent of all days lost. On average, 30.1 working days were lost per case of work-related mental ill health, compared with an average of 21.2 days per case for all forms of work-related illness.

Based on the estimate given above of £120 for the average cost of a day's sickness absence, these figures imply that the overall cost to employers of work-related mental health problems in 2005/06 amounted to £1.26 billion at the national level. Spread over the whole workforce, this was equivalent to a cost of £50 per average employee.

Finally, it is worth noting that, after having risen substantially during the 1990s, the number of working days lost because of work-related mental ill health now appears to be on a downward trend, having fallen to 10.5 million in 2005/06 from 12.9 million in 2001/02, a decline of 18.4 per cent. However, the number of days lost attributable to all forms of work-related illness fell even more sharply, by 23.4 per cent, with the result that work-related mental ill health now accounts for a larger share of the total.

Management systems for measuring and costing sickness absence

A recurring theme of this paper is that the scale and cost of mental health problems in the workforce are not well understood by many employers. In the case of sickness absence, this is in part a reflection of wider shortcomings in management information systems. A recent report on absence management by the Work Foundation noted that, “employers – with a few exceptions – are generally poor at recording, monitoring, analysing and costing absence” (Bevan, 2003). For example:

- Many organisations suffer from under-recording of absence; only 22 per cent are confident that all their absence is being recorded (Bevan, 2003).
- Only 42 per cent of organisations benchmark their absence rates against other organisations; while only 42 per cent have a target for reducing absence (CIPD, 2007a).
- Only 45 per cent of organisations monitor the costs of absence, a proportion that falls to 22 per cent among smaller employers, i.e. those with 1-50 employees (CIPD, 2007a).

Sickness absence is particularly likely to be under-recorded in relation to mental health problems, because of the significant scale on which these problems go unrecognised and undiagnosed in the workforce and also because of the possible unwillingness of many employees to be labelled as mentally ill.

Reduced productivity at work

Defining and measuring ‘presenteeism’

Presenteeism is defined as the loss in productivity that occurs when employees come to work but function at less than full capacity because of ill health. In general the costs of presenteeism are less obvious and more difficult to measure than those of absenteeism, but there is accumulating evidence to show that losses in on-the-job productivity attributable to ill health are greater in scale, perhaps several times greater, than the corresponding losses associated with sickness absence. There are also good reasons for supposing that presenteeism is particularly important in the case of mental ill health.

Ideally, the measurement of presenteeism would be based on objective assessments of work

performance. Many companies have developed systems of performance measurement for wider management purposes, but these suffer from a number of limitations in the present context. For example, they vary greatly in coverage and quality; the wide range of attributes that contribute to overall performance in many jobs means that objective measurement is often far from straightforward; and measures developed for one type of work are not always relevant or directly applicable to another, leading to a multiplicity of job-specific measures which can hinder the scope for comparison and the generalisation of findings. Furthermore, employers face serious practical difficulties in relating management data on performance to the health status of individual employees, most obviously in the case of health conditions which are undiagnosed and untreated.

Partly in response to these problems, research on the measurement of presenteeism has in recent years focused on the development of instruments that rely not on management or administrative data on performance but on self-report information collected from samples of employees. A number of such instruments have been developed over the last decade, mainly in the United States, and the leading examples are described and assessed in a recent review article (Lofland, Pizzi & Frick, 2004). The findings of this review generally support the validity of the questionnaires reviewed. In particular, there is evidence that, for a range of jobs where soundly based comparisons can be made, self-report assessments of performance (and health-related changes in performance) correlate well with matching data based on objective measures. Box 1 (overleaf) gives an example of such a survey.

The precise methods used for assessing work performance vary considerably and the measurement of presenteeism based on self-report data is still evolving. One consequence of this is that estimates of the scale of health-related presenteeism vary quite widely from study to study. Some reasonably clear findings are nevertheless emerging from this expanding literature, as summarised below.

International evidence

Most research on the scale and cost of presenteeism has been published in the last five years. Most of it comes from the US, although reference is also made to studies from Australia and Canada.

Box 1: The Health and Work Performance Questionnaire (HPQ)

The Health and Work Performance Questionnaire (HPQ) has been developed by the World Health Organisation (Kessler *et al.*, 2003; Kessler *et al.*, 2004). This is a self-report instrument that is designed for estimating the workplace costs of health problems in three dimensions: reduced job performance, sickness absence and work-related accidents and injuries.

For reduced job performance, the survey proceeds in two parts. First, respondents are asked a series of questions that require them to review aspects of their performance at work over the last 28 days; for example, how often the speed or productivity of their work was lower than expected, how often they did no work at times they were expected to be working, how often the quality of their work was lower than expected, and so on. These questions encourage active memory search about good and bad performance over the past 28 days but are not directly used in the measurement of presenteeism. Instead, measurement is based on answers given in the second part of the survey, which asks respondents to rate the average person working in their job on a 0-10 scale of work performance, to rank themselves on this scale in terms of their usual performance and finally to rank themselves over the past 28 days during the time they were at work.

The stated justification for using a simple self-report global rating scale is that workers are better placed than researchers to recognise the dimensions of performance that are most relevant to their particular jobs, to evaluate their recent performance in these dimensions and to arrive at a rating of their overall performance based on this evaluation. Combined with health data collected in a separate part of the questionnaire, the information on performance ratings can readily be manipulated to compute the scale of losses in on-the-job productivity that are attributable to ill health, measured in a form (equivalent working days lost) that allows direct comparisons to be made with the corresponding losses associated with sickness absence. Also, estimated numbers of working days lost can be combined with relevant data on earnings so as to provide a measure of presenteeism in terms of financial cost.

The bulk of published studies on presenteeism relate to specific health conditions or groups of related conditions. A smaller number have sought to take a broad approach, looking at the scale of presenteeism for most or all health conditions combined.

The most widely quoted study of this type (Goetzel *et al.*, 2004), combines evidence based on five different survey instruments to produce estimates of the costs of presenteeism for 10 broad groups of health conditions in the US. In aggregate, the cost of presenteeism for these conditions is equivalent to about 4.5 per cent of the national pay bill. (A similar proportion in the UK would imply a total cost of around £32 billion a year or £1,300 per average employee.) With one exception (respiratory infections), the estimated costs of presenteeism are significantly higher than the corresponding costs of absenteeism in all 10 groups of conditions.

Similar findings are reported in another broad-based study for the US (Stewart, Matousek & Verdon, 2003), which finds that, across all health conditions, losses in productivity because of presenteeism are 2.6 times as large as those resulting from absenteeism. Even larger multiples are reported in two US studies which look at presenteeism in individual companies. Thus a study of chronic health conditions in the US workforce of the Dow Chemical Company has found that in cost terms presenteeism is 6.8 times as important as absenteeism (Collins *et al.*, 2005), while a study covering all health conditions in a large telecommunications company quotes a multiple of 6.0 (Ozminowski *et al.*, 2004). In contrast, a study of employees in an Australian call centre has found that the relative cost of presenteeism was 1.9 times the cost of absenteeism (Tilse & Sanderson, 2005).

The wide spread of figures in these studies suggests that some caution is needed in drawing general conclusions. The evidence does, however, point clearly to a finding that, at the aggregate level, health-related presenteeism imposes a substantial cost on employers and one that is almost certainly of a greater magnitude than the corresponding cost of absenteeism.

Very similar conclusions emerge from the evidence on presenteeism relating specifically to mental health problems. Thus a review of published studies in this area again shows that there is a fairly wide range of estimates for the scale of presenteeism relative to absenteeism but also a general finding that presenteeism has the larger effect. The results of these are summarised in Box 2.

Box 2: Results of the leading studies of presenteeism and mental health

Goetzel *et al.* (2004) examined “depression and other mental illnesses” as one of the 10 broad groups of conditions and found that the productivity losses of presenteeism associated with mental health problems are 5.1 times as large as the equivalent losses resulting from absenteeism.

Stewart *et al.* (2003) assessed the costs of lost productive time among US workers with depression and found that presenteeism accounts for 4.6 times as many hours lost as absenteeism.

A recent study of the effects of mood disorders on work performance in a representative sample of US workers (Kessler *et al.*, 2006) shows the following relativities for work days lost due to presenteeism compared with absenteeism: major depressive disorder 2.1, bipolar disorder 1.9, and mania/hypomania 2.2.

A Canadian study of mental illness in the workplace (Dewa & Lin, 2000) found that psychiatric disorders are responsible for 23 times as many partial disability days (i.e. presenteeism) as total disability days (i.e. absenteeism). As evidence from other studies suggests that the average loss of productivity on a partial disability day is in the range 10-40 per cent of usual output, even taking the 10 per cent figure, this implies that the scale of presenteeism associated with mental health problems is 2.3 as large as the scale of absenteeism.

Results from the WORC project on depression in the workplace in Australia indicate that the costs of presenteeism for depression are 1.9 times as large as the equivalent costs of absenteeism (Hilton, 2007).

A number of studies make the more general point that mental health problems often lead to responses among workers that are different from those associated with physical ill health. As one remarks, “respondents with mental health problems...are far more likely to show up for work” (Dewa & Lin, 2000). Two reasons have been suggested for this:

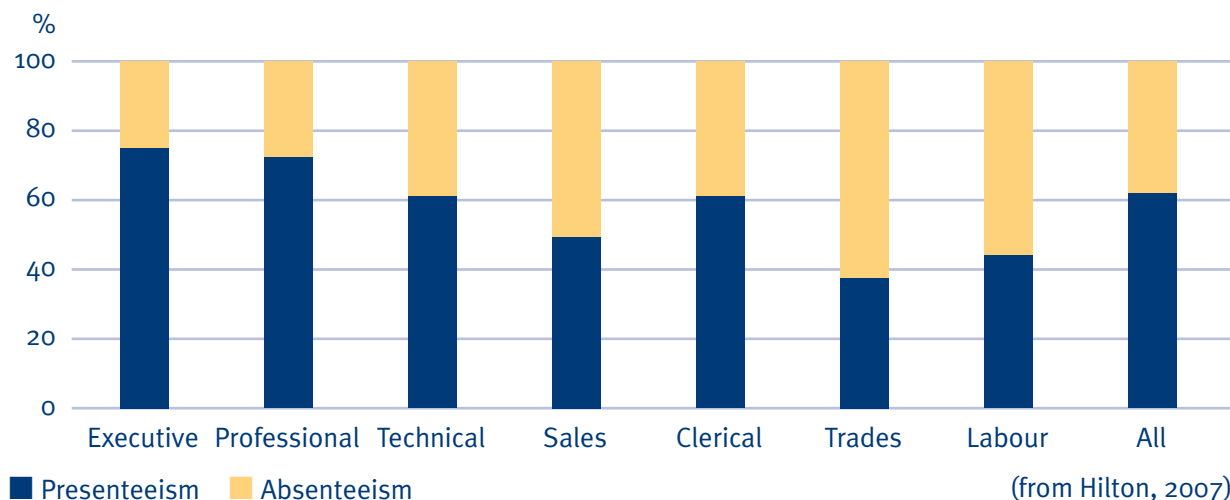
“The most common explanation for why differences occur between how mental and physical illnesses are addressed is stigma. Workers may be concerned about being labelled as mentally ill by their employers and co-workers for fear of the ramifications...In addition, the threshold of when a condition justifies taking a sick day may differ for mental and physical

problems. Where physical symptoms often provide concrete and visible evidence of impairment, mental symptoms are often hard to distinguish from ordinary ‘off-days’” (Dewa & Lin, 2000).

Whatever the precise explanations, there does seem to be a broad consensus in the research literature that, in comparison with many physical health conditions, productivity losses resulting from mental ill health are particularly likely to be manifested in the form of presenteeism rather than absenteeism.

An interesting gloss on this generalisation is that the balance between presenteeism and absenteeism appears to vary considerably by occupation (see Figure 4).

Figure 4: Comparing productivity losses in different occupations



In particular, productivity losses caused by mental health problems are more likely to take the form of presenteeism rather than absenteeism among white-collar workers than they are among blue-collar workers. Good evidence for this comes from the WORC project in Australia. Figure 4 (page 13) shows the breakdown of productivity losses among male workers with depressive symptoms (Hilton, 2007).

Figure 4 shows that in the professional and executive groups around three-quarters of productivity losses take the form of presenteeism, while in the trades and labour groups the corresponding proportion is less than half. One implication of such evidence is that, looking ahead, presenteeism will become increasingly important relative to absenteeism at the aggregate level, as the balance between manual and non-manual jobs in the economy continues to shift towards the latter.

Estimating the costs of presenteeism in the UK

Detailed information based on sample surveys of employees is not available for the UK on the costs of presenteeism associated with mental ill health. Any attempt at quantification must therefore rely to a large degree on the international evidence summarised above.

A review of the main published studies indicates that, as a very rough average, productivity losses for presenteeism attributable to mental health problems are perhaps three times as large as the equivalent losses for absenteeism. Any such figure is of course subject to a wide margin of error, but may nevertheless be useful as a starting point.

As noted earlier, sickness absence because of mental health problems amounts to 2.8 days a year per average employee in the UK workforce, or 70 million days in total for a workforce of 25.0 million. Using a multiple of three, the corresponding scale of presenteeism is therefore 8.4 equivalent working days lost per employee, or 210 million days lost in total. Based on a unit cost of £120 per day as used in costing sickness absence, the overall costs of presenteeism on this set of assumptions are £1,008 per average employee in the workforce, or £25.2 billion at the national level.

A number of factors need to be taken into account in refining this figure. The most important of these are as follows:

1. The evidence base relies heavily on data for the US. This will almost certainly lead to an

overstatement of the scale of presenteeism relative to absenteeism if translated directly to the UK. The main reason for this is that the coverage of occupational sick pay is markedly lower in the US, where only about half of all workers get paid sick leave compared with over 90 per cent in this country (Levin-Epstein, 2005). From the employee's point of view, sickness absence thus imposes a larger financial penalty in the US, with the result that proportionately fewer days are likely to be taken off work and a correspondingly higher proportion of the overall productivity costs of ill-health will be reflected in presenteeism. (This factor may help to explain why the estimated costs of presenteeism relative to those for absenteeism are towards the low end of the range in Australia, where the coverage of sick pay is also better than in the US.)

2. The overall costs of absenteeism and presenteeism are the product of two factors: numbers of working days lost and an average wage per day. While lower-paid workers tend to take more days off work than higher-paid workers, there is no such relationship in the case of presenteeism. For example, the WORC project in Australia has found that among full-time employees with depressive symptoms, numbers of equivalent working days lost per year because of presenteeism are broadly the same in absolute terms for executives and professionals as they are for operators and labourers. This implies that the appropriate average wage to be used in calculating the costs of presenteeism should be higher than the average for absenteeism.
3. Much of the international evidence on mental ill health and presenteeism relates specifically to depression and this condition may not be representative of mental health problems more generally. Such limited evidence as is available on this question is in fact reassuring. In particular, an Australian study of lost productivity among full-time workers with mental health problems (Lim, Sanderson & Andrews, 2000) gives estimates of work loss days (absenteeism) and work cutback days (presenteeism) for different types of condition and finds that the ratio between the two is almost exactly the same for depression as the average for other conditions.

The first point suggests fairly strongly that a starting assumption of a threefold difference in the relative size of presenteeism and absenteeism in the UK is too high. The second point highlights

the need to distinguish between numbers of days lost and the costs of days lost; it too implies that a multiple of three is too high if intended as a relative measure of *days* lost, because several of the studies on which it is based give results in terms of *costs*, which will always tend to give a higher figure.

Taking into account these points, a revised central assumption is that presenteeism attributable to mental health problems in the UK accounts for 1.5 times as many working days lost as absenteeism. The international literature suggests that a multiple of this order is almost certainly on the conservative side. It should also be emphasised that the figure is subject to a wide margin of error.

The proposed multiple implies that presenteeism attributable to mental health problems results in 4.2 lost working days a year per average employee, or 105 million days lost in total. In order to translate these figures into financial terms, it is proposed to use a unit cost of £144.25 a day, corresponding to average gross daily compensation per employee in the UK economy. This is higher than the daily cost of £120 used in costing absenteeism, for two reasons: first, taking into account the WORC evidence, no adjustment needs to be made for any inverse association between presenteeism and earnings; and second, again in contrast to absenteeism, it seems reasonable to assume that the costs of presenteeism are borne in full by employers rather than falling partly on employees.

The costs of presenteeism attributable to mental health problems in the UK workforce are thus estimated at £605 per average employee, or £15.1 billion in total. The figures imply that in cost terms presenteeism is 1.8 times as important as absenteeism.

Staff turnover

According to the latest version of an annual survey of recruitment, retention and turnover carried out by the Chartered Institute of Personnel and Development (CIPD, 2007b), the average labour turnover rate in employing organisations in the UK is estimated at 18.1 per cent for 2006. A similar survey by the CBI for the same year gives a lower figure of 14.7 per cent (CBI, 2007). Use is made here of an average of 16.4 per cent, which – for an employed workforce of 25 million – implies that over four million jobs change hands every year. Some of these changes are of course unavoidable, for example those associated with

old-age retirements, and turnover can have positive as well as negative effects. Nevertheless, some costs are always incurred when employees leave organisations, and the CIPD survey found that over 70 per cent of employers reported an adverse effect of staff turnover on business performance and over half reported that they were aiming to reduce their level of turnover in the coming year.

As with the costs of absenteeism and presenteeism, measuring the costs of labour turnover is far from straightforward and the published literature – international as well as domestic – shows a wide range of estimated costs. According to one US report, “a rule of thumb sometimes used is that it costs half a year’s salary to hire a replacement” (Latimer, 2002), while a publication by the American Management Association refers to studies which put the cost of replacing an employee at anything between 25 and 200 per cent of the employee’s annual pay (Branham, 2001). A number of factors lie behind such variation. For example, costs may vary according to the overall state of the labour market, being higher when conditions are tight and numbers of vacancies exceed the numbers seeking work. Similarly, costs tend to vary by type of staff, generally being higher (proportionately as well as absolutely) for senior managers and executives than for clerical and manual grades.

Quantitative estimates also vary because of differences in their coverage of the various elements of cost that are associated with staff turnover and in the way these individual components are measured. These components of cost include:

- Separation costs, including redundancy payments.
- Recruitment and selection costs, for example advertising, HR administration and interview costs.
- Hiring costs, including the costs of induction and on-the-job training.
- Loss of productivity costs, including vacancy costs, pre-departure productivity losses and learning curve effects among new employees.

Some of these are relatively straightforward to identify and cost, but others are not, particularly the effects on productivity.

The CIPD survey found that while 53 per cent of respondents report calculating a narrow measure of costs covering only recruitment and selection, just 10 per cent calculate the full costs of labour turnover. When asked why they do not make the latter calculation, 66 per cent

of responding organisations said they did not require information on labour turnover costs, a finding which the CIPD describes as “surprising”. Whatever the reasons, it certainly suggests that the great majority of UK employers are not well informed about the overall costs of staff turnover.

In terms of quantitative estimates, the CIPD survey quotes figures of £4,333 for the costs of recruitment and selection per employee and £7,750 for the overall costs of turnover. It was noted earlier that average total compensation per employee in the UK was £28,850 in 2006. The estimate of £7,750 for the total costs of staff turnover as given in the CIPD survey represents only 27 per cent of this figure, very much towards the bottom end of the range in the US review cited above (and well below the suggested “rule of thumb” of 50 per cent). In all likelihood it is an under-estimate of the true costs of turnover and it is proposed here to increase the figure by a half, broadly in line with the adjustment made earlier to the daily cost of sickness absence as reported by employers. In round terms, the unit cost of labour turnover is therefore assumed to be £11,625 (or 40 per cent of average compensation per employee). This in turn implies that the total cost of turnover to employers is £47.7 billion (4.1 million job changes x £11,625 unit cost), equivalent to 6.6 per cent of the national pay bill.

All causes of staff turnover are combined in this estimate of total cost. The remaining question is to assess what proportion of the total can be attributed to mental health problems as a cause of turnover. Unfortunately the CIPD survey provides only limited and indirect evidence on this question and no other source of information has been uncovered. The best that can be done is therefore to provide some illustrative figures.

The CIPD survey includes a question on “key reasons for employee turnover”, but this is not in a form that allows total turnover to be broken down by cause as more than one reason can be given in any reply. “Stress” and “ill-health other than stress” both appear among the top 10 reasons for turnover, being cited by 14 and 13 per cent of employers respectively. It would clearly be incorrect, however, to conclude that, taken together, these two causes account for 27 per cent of all instances in which employees leave their organisations. The true proportion is almost certainly lower than this, and probably a great deal lower, if only because there are eight other causes of turnover more commonly mentioned by employers. In addition, the category “ill-health other than stress” includes physical as well as

mental ill health as a cause of turnover, thus reducing still further the proportion attributable to mental health problems, broadly defined to include stress.

A reasonable estimate might be that, at most, mental health problems including stress account for five per cent of total staff turnover. This represents an aggregate cost to employers of around £2.4 billion a year or, spread over the whole workforce, a cost per average employee of £95 a year. By comparison with absenteeism and presenteeism, the cost of staff turnover looks to be relatively small on any plausible set of assumptions, implying that a degree of imprecision in the costings for this factor is not of major importance in the overall picture.

Overall costs to employers

Combined costs

This paper has so far sought to quantify three main components of cost associated with mental health problems in the workforce. Estimates of these costs for the UK economy in 2006 are summarised in Table 2.

Table 2: The costs combined

	Cost per average employee £	Total cost to UK employers £ billion	Per cent of total
Absenteeism	335	8.4	32.4
Presenteeism	605	15.1	58.4
Turnover	95	2.4	9.2
Total	1035	25.9	100.0

Total employee compensation in the UK economy amounted to £721.3 billion in 2006, equivalent to £28,850 per average employee. The costs of mental health problems falling on employers thus amount to 3.6 per cent of the national pay bill. By any standards this is a sizeable figure. Subject to the various qualifications noted earlier, presenteeism is reckoned to be the largest individual component of cost, accounting for nearly three-fifths of the total. In contrast, sickness absence represents less than a third of the total, running contrary to the view of

employers, as summarised in the finding of a recent survey that “Employers’ principal concern with mental health and stress was with levels of sickness absence” (Rolfe, Foreman & Tylee, 2006).

Expressing these figures in a different way, a small company employing 50 workers will typically incur costs of around £50,000 a year because of mental health problems among its employees, while at the other end of the scale the country’s biggest employer – the NHS, with around 1.3 million workers – will face annual costs of over £1.3 billion. Taking into account differences in rates of sickness absence and in wage levels, it can also be calculated that in a workforce consisting wholly of manual workers average costs per worker would amount to around £850 a year (equivalent to 4.3 per cent of total compensation), while the equivalent figure in a workforce of non-manual employees would be around £1,125 a year on average (3.3 per cent of total compensation).

These figures are of course based on broad averages and assume that costs by type of employee are the same in all organisations. In practice this is unlikely to be the case, although evidence on the extent of cost variation is limited and inconclusive. For example, the published statistics on sickness absence (all causes) appear to show that absenteeism is lower in small companies than in large ones and also lower in the private sector than in the public sector. However, the first of these differences may reflect at least in part the under-reporting of sickness absence in small organisations, where the maintenance of accurate formal records is less widespread than in larger companies. Analysis of the 2005 HSE survey of workplace absence, meanwhile, shows that the variation between the private and public sectors largely disappears when allowance is made for differences in the age and gender profiles of their respective workforces and in the size of employing organisation (Health and Safety Executive, 2005). Reliable data on the extent of variation in presenteeism is even more limited.

For completeness, three further points merit brief discussion.

Managing mental health at work

As emphasised throughout this paper, mental health problems are widespread in the workforce and cannot therefore be ignored by any employer. The way in which mental health issues are handled at work is an important management responsibility and inappropriate

forms of response, such as hostile or stigmatising attitudes or the perpetuation of stressful working conditions, can give rise to costs that are additional to those quantified above. Mismanaging mental health problems in the workplace has both reputational and legal risks.

Reputational risks

It is generally accepted that goodwill and loyalty, whether among employees or customers, are business assets. A company which has a good reputation for supporting its staff at times of personal difficulty may gain an advantage over its competitors in keeping existing members of staff and attracting new ones; similarly, the morale and engagement of all employees may be improved as people realise that they themselves will be treated fairly if they experience mental health or other problems.

An organisation which is known for imposing a stressful working environment may face difficulties in recruitment and retention and also suffer from low morale. Customer loyalty may be lost if high rates of absenteeism and presenteeism result in poor quality of service, while companies which have a good reputation for caring about the wellbeing of their workforce may generate goodwill among potential customers as well as employees. Arguments on these lines have been particularly emphasised by the Employers’ Forum on Disability, in publications which develop the theme that “disability confidence builds better business” (Suter, Scott-Parker & Zadek, 2007). While written in the context of disability generally, these publications are particularly relevant to mental ill health, as workplace attitudes indicate continuing widespread stigma and discrimination against people with mental health problems.

Legal risks

All employers have a duty of care under health and safety legislation regarding the health, including mental health, of their employees. They are also required to comply with the requirements of the Disability Discrimination Act, which seeks to prevent employees from being treated unfavourably on the grounds of disability including mental illness and which requires employers to make reasonable adjustments to working conditions so as to avoid putting disabled workers at a disadvantage.

Failure to meet these obligations may lead to compensation claims, including breach of contract. Recent court rulings have clarified the nature of these obligations and signalled, for example, that all employers should take

preventive action to avoid workplace stress. Management standards produced by the Health and Safety Executive help employers to assess and manage the risks of such stress (Health and Safety Executive, 2004). Legal and reputational risks are inter-related to the extent that companies may be keen to avoid compensation claims not only because of the direct financial costs but also because of the adverse publicity that is usually associated with court cases.

There is no straightforward or established way of quantifying the costs of reputational and legal risks and in any event the costs are likely to vary substantially from one type of organisation to another. For example, reputational effects may be particularly important for companies which operate in a highly competitive market environment, as even relatively minor changes in customer perceptions may lead to substantial shifts of business between individual suppliers. The fact that such effects cannot meaningfully be quantified at an aggregate level does not necessarily imply that they are of minor importance.

Mental health problems and physical health

It has been suggested throughout this paper that most employers tend to under-estimate the scale of mental health problems in the workforce. Various possible reasons have been advanced for this, including negative or stigmatising attitudes towards mental ill health. One contributory factor not so far discussed in any detail is that there are complex and varied interactions between mental and physical health and failure to allow for these effects may serve to reinforce any pre-existing tendency to understate the overall importance of mental health problems and conversely to overstate the role of physical ill health.

A full review of the relationship between mental and physical health is beyond the scope of this paper, but three points may be noted.

First, mental health problems, particularly common conditions such as depression or anxiety, often manifest themselves in physical symptoms for which there is no detectable underlying physical condition, a process known as somatisation. Common medically unexplained symptoms include pain, fatigue and dizziness. Syndromes that represent organ-specific groups of medically unexplained symptoms have also been defined, for example irritable bowel syndrome. It has been estimated that a third of all medical outpatients have medically unexplained

symptoms, rising to 50 per cent for outpatients in cardiology, gastroenterology and neurology (Bass, 2003).

In the face of such evidence, it seems highly likely that a significant proportion of health-related absence and under-performance in the workplace is incorrectly ascribed to physical illness when the underlying causes are in fact psychological or emotional. To illustrate the possible effects, it has been estimated earlier that 40 per cent of all health-related absence from work is attributable to mental health problems and hence 60 per cent to physical ill health. If a third of the latter reflects medically unexplained symptoms that are psychological in origin, in line with the evidence on medical outpatients, then it follows that mental ill health as a cause of sickness absence is understated by half: the proportions for each are in fact reversed.

Second, there is good evidence that mental health problems increase the prevalence of a range of physical health conditions, including coronary heart disease, stroke, cancer, diabetes, respiratory diseases including asthma, infections and injuries (Prince *et al.*, 2007; Blaug, Kenyon & Lekhi, 2007; Osborn *et al.*, 2007). Such evidence is increasingly available from population-based longitudinal studies which track the health of individuals over time and allow the analysis of cause and effect.

For some conditions the association between mental and physical health is very strong. For example, “individuals with depressive disorders are about twice as likely to develop coronary artery disease, twice as likely to have a stroke [and] four times as likely to have a myocardial infarction... as people without depressive disorders” (Sederer *et al.*, 2006). It has been estimated that depression and stress explain around 30 per cent of the total risk of heart attacks in the US (Partnership for Workplace Mental Health, 2006). The precise nature of the link between mental and physical health varies from one condition to another, but there is evidence that mental health problems are associated with a wide range of lifestyle-related risk factors for poor health such as smoking, excessive drinking, reduced physical activity and poor diet and also that mental distress has various biological effects, including physiological reactions which can weaken the immune system and so increase vulnerability to illness.

Such evidence implies that the overall importance of mental health problems in the workforce will be understated unless allowance is made for

these indirect or second-round effects. Exactly what adjustment should be made for this is not clear-cut, as the causal links between mental and physical health go both ways; in other words, poor mental health can be a consequence of poor physical health as well as the other way round. It nevertheless remains the case that if the prevalence of mental health problems were reduced, the overall impact on worker productivity would be greater than implied by the cost estimates for absenteeism and presenteeism related only to mental ill health, because of the beneficial secondary effects on physical health.

Finally, there is evidence that mental health problems have adverse effects not only on the prevalence of other conditions but also on their prognosis. In other words, compared with physical illness on its own, co-morbidity (physical illness accompanied by mental illness) worsens outcomes such as life expectancy, sometimes substantially. For example, stroke patients who are depressed are four times as likely to die within six months as those who are not depressed (Sederer *et al.*, 2006). Mental ill health can cause delays in seeking help, reduce the likelihood of accurate diagnosis and adversely affect adherence to medication and to recommendations for changes in health-related behaviours such as exercise and diet. As before, improvements in mental health would yield both direct and indirect benefits in terms of the potential impact on productivity.

Wider effects on the business community

All the preceding analysis has focused on the effects of mental health problems in the workforce on individual organisations. In addition, there are wider consequences of mental ill health whose impact on business is best considered at the aggregate level. Two such consequences are considered here: the effect of mental health problems on the overall supply of labour and their effect on the level of taxation in the economy.

Labour supply

It can be estimated from the ONS survey of adult psychiatric morbidity (Meltzer *et al.*, 2002) that there are around 3.3 million people of working age with mental health problems who are not in any kind of paid work. This corresponds to around one in 12 of the total working age population. The figure of 3.3 million represents a theoretical maximum for the overall reduction in labour supply associated with mental ill health: the numbers who might realistically be expected or

enabled to find work will be very much lower. In some cases this will be because people are too ill to work, but more importantly because there are large numbers of people with mental health problems who have withdrawn from the labour market for other reasons, for example because they have family responsibilities or have taken early retirement.

A more realistic estimate of the labour supply effect can be calculated. The 3.3 million people with mental health problems not in work fall into two groups: those who are unemployed and those who are economically inactive; the difference being that while both groups are out of work the unemployed are actively seeking employment while the inactive are not. All those describing themselves as unemployed should clearly be considered as part of the economy's potential labour supply. In numerical terms, this group accounts for around 15 per cent of the total with mental health problems not in work, equivalent to 0.5 million people.

Of the remaining 2.8 million people with mental health problems who are not working, about one million are in receipt of Incapacity Benefit, accounting for nearly 40 per cent of the total caseload for this benefit. As part of its wider programme of welfare reform, the Government has recently announced major changes in the design and operation of Incapacity Benefit, with an associated aim of reducing the overall numbers receiving the new Employment and Support Allowance by one million (Department for Work and Pensions, 2006). Assuming that the target applies equally to all recipient groups, the implication is that around 0.4 million people with mental health problems currently in receipt of Incapacity Benefit will in time re-enter the labour market.

Taken together, these two estimates yield a figure of 0.9 million for the overall number of people with mental health problems who are not currently working but can realistically be considered as employable. If all were to find employment, the UK workforce would increase by around three per cent. Put another way, based on an average working year of 200 days, the current non-employment of this group implies an annual loss of 180 million working days. As seen earlier, total days lost among people with mental health problems who are currently in paid employment is estimated at around 70 million a year. Losses from long-term absence associated with non-employment are therefore 2.6 times as large as those resulting from short-term absence.

One other effect on labour supply is the time

that is spent by family and friends caring for people with mental health problems, some of which might otherwise have been spent in paid work. Using data from the 2001 Census, a recent report published by Carers UK shows that there are nearly six million carers in the UK, including 1.25 million spending 50 hours or more each week on caring responsibilities and a further 0.66 million spending 20-49 hours a week (Buckner & Yeandle, 2007). It has separately been estimated that 16.5 per cent of all caring time is devoted to people with mental health problems, equivalent to the time spent by around one million carers (Sainsbury Centre for Mental Health, 2003). Unfortunately it is not possible to assess with any accuracy how much working time is lost by these people, but some adverse effect must be expected.

Taxation

A previous Sainsbury Centre report estimated that the costs of mental ill health falling on taxpayers were about £25 billion in England in 2002/03 (Sainsbury Centre for Mental Health, 2003). The figure includes the cost of public spending on health care and social security benefits for people with mental health problems and also the tax component of output losses in the economy which result from the negative impact of mental illness on people's ability to work.

Updating this figure to 2006/07 values and also grossing up to cover all of the UK and not just England, it is broadly estimated that the cost of mental ill health falling on UK taxpayers now amounts to £35 billion a year. As the aggregate yield of taxes and national insurance contributions was £486 billion in 2006/07 (HM Treasury, 2007), this is equivalent to 7.2 per cent of the total tax burden. While it is obviously not sensible to allocate the mental health share to specific taxes, it is nevertheless of interest to note for the purposes of comparison that the total yield of corporation tax in 2006/07 was £45 billion, while the yield of business rates was £21 billion (HM Treasury, 2007).

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The Employment Programme at the Sainsbury Centre seeks to influence and bring together policy, research evidence and practice in employment and mental health. We aim to enhance the employment prospects of people with mental health problems and help people to improve the quality of their lives. We focus on the importance of employment in recovery and the promotion of mental health and wellbeing in the public and private sector workforce. We work across the UK, disseminating the lessons learnt through learning networks, publications and engagement with policy makers.

Our work is relevant to policy makers, practitioners, people who experience or have experienced mental health problems, carers, service commissioners and employers.

Our priorities

We have three key priority areas:

- ❖ Working with service providers and the health care professions (commissioners, practitioners and regulators) across primary and secondary care to promote evidence-based practice in vocational rehabilitation for people with mental health problems, and to raise awareness of the link between employment and mental health.
- ❖ Working with employers on mental health promotion, prevention, retention and rehabilitation.
- ❖ Increasing the development of employment pathways for people with mental health problems in the criminal justice system, including secure hospitals.

For further information on our work, to keep up-to-date on policy developments and to register for our monthly email bulletins visit our website at www.scmh.org.uk

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