

Ageing and the workplace

A report from the BMA occupational medicine committee September 2016



British Medical Association bma.org.uk

Authors

Dr Paul Nicholson, Dr Grant Mayho, Dr Susan Robson, Dr Chris Sharp

This report was prepared under the auspices of the occupational medicine committee of the British Medical Association. While aimed primarily at medical professionals, this booklet may also assist other healthcare professionals, managers, human resources specialists and employee representatives.

Occupational medicine committee

This representational committee of the BMA considers and report on matters affecting the health, safety and welfare of persons at work and the practice of medicine in industry and allied occupations. The committee is charged with advising the association on the implementation of health, safety and welfare legislation as it affects its members and their working environment.

Membership for 2015/2016:

Elected by the BMA representative body

Dr Paul Nicholson (Chair) Dr Susan Robson Dr Nigel Wilson

Appointed by BMA council

Dr David Fox Dr Grant Mayho Dr Chris Sharp

Otherwise Appointed

Dr Ian Murphy – Representative Faculty of Occupational Medicine and Society of Occupational Medicine Dr Ragadeepika Siddabathuni – Co-opted member representing occupational medicine trainees Dr Mark Weir – BMA council member representing doctors in occupational medicine

Secretary

Rosie Hogwood-Helm

© British Medical Association – 2016 all rights reserved. No part of this publication may be reproduced or transmitted in any form or by any means, or stored in any retrieval system of any nature without written permission, except for permitted fair dealing under the Copyright, Designs and Patents Act 1988, or in accordance with terms of a licence issued by the Copyright Licensing Agency in respect of photocopying and/or reprographic reproduction. Application for permission for other use of copyright materials including permission to reproduce extracts in another published works shall be made to the publishers. Full acknowledgement of author, publisher and source must be given.

Preface

This report is aimed primarily at occupational physicians responsible for the care of working populations and other doctors who care for people of working age. It is hoped that the contents are also relevant and of interest to others; including other health professionals, employers, human resource professionals, safety personnel and employee representatives.

The report was written to meet a clear need expressed by occupational physicians for information to help them deal with questions they face regularly in practice from both employees and employers as a consequence of the UK workforce getting older.

There are more over fifties in employment in the UK than ever before and the employment rate of older people is on the increase.¹ In August 2016 over 1.2 million people were working beyond age 65.² Several factors have contributed to this ageing of the workforce.

- People born post-World War II to 1964 are now in their fifties and sixties; the first reached the age of 70 years in 2016
- The UK default retirement age was abolished in 2011 making it is unlawful to compulsorily
 retire an employee because of age, unless it can be justified objectively as a proportionate
 means of achieving a legitimate aim.³ Consequently people can work for as long as they
 want and are able. Older workers can still retire voluntarily and draw any occupational
 pension to which they are entitled
- Falling birth rates and increased lifespans put pressure on economies, public finances and pension schemes. People will have to work longer to meet labour market needs and to have adequate retirement income as they live longer
- State pension is increasing from 60 for women and 65 for men. From 2020, both men's and women's state pension ages will be 66, increasing to 67 between 2026 and 2028, and then linked to life expectancy thereafter. The government will review state pension age at least once every five years.⁴ The timetable for the foreseen increase in state pension age to 68 could be accelerated as a result of a future review

This report focusses on the occupational factors of an ageing workforce. While health is a determinant of how long people continue to work there are also emotional, personal and financial factors. Work brings many benefits including self esteem, companionship and a salary. The employment status of an employee's partner, caring responsibilities, hobbies and interests, relationships at and outside of work and financial security all influence a person's decision to retire or to continue to work.⁵

¹ Department for Work and Pensions. Fuller Working Lives – Background Evidence. Department for Work and Pensions. London. 2014.

² Office for National Statistics. UK Labour Market: August 2016. Office for National Statistics. Newport. 2016.

³ Employment Equality (Repeal of Retirement Age Provisions) Regulations 2011).

⁴ Pensions Act 2014.

⁵ Morrell G, Tennant T. Pathways to retirement: The influence of employer policy and practice on retirement decisions. Research Report 673. Department for Work and Pensions. London. 2010.

Contents

Executive summary	2
Chapter 1 – Background	3
1.1 Changes in human populations	3
1.2 Ageing of the UK population	4
1.3 People of working age and state pension age	6
1.4 International perspective	6
1.5 Summary	6
Chapter 2 – Perceptions of older workers	7
2.1 Employers' opinions of older workers	7
2.2 Positive perceptions	8
2.3 Negative perceptions	8
2.4 Workers' perceptions of ageing, health and capability	9
2.5 Summary	9
Chapter 3 – Biological effects of ageing	10
3.1 Functional impairment	10
3.2 Health conditions	11
3.3 Sickness absence	13
3.4 Shift work	13
3.5 Occupational injury	14
3.6 Summary	14
Chapter 4 – Occupational health and safety needs	15
4.1 Risk assessment and risk management	15
4.2 Occupational health: interventions and support	17
4.3 Summary	18
Chapter 5 – Active age management	19
5.1 Active ageing	19
5.2 Challenges faced by employees	19
5.3 National age management policies	20
5.4 Workplace age management	20
5.5 Workplace age management good practice	20
5.6 Summary	22
Chapter 6 – Practice based recommendations	23
Chapter 7 – Resources	24
References	25

Executive summary

This report aims to provide an overview of the impact of ageing populations, discuss common myths and facts about ageing and health in people of working age and to provide information about the health and safety needs of older workers as well as to detail some employment practices that have been found to work.

The report aims to cite the most comprehensive and most recent sources of evidence. Where possible this citation is to a systematic review, which includes all earlier original studies in that area. Direct reference to original studies is made where there is no systematic review, where they are not included in the reviews, or where they are necessary to support an important point.

Historically low birth rates and increasing life expectancy mean that populations around the world are ageing. This demographic trend will continue over forthcoming decades such that the dependency ratio of young to old will fall. This means that, in the absence of migration, there will be ever fewer younger people available for work and a need for people to work until later in life, especially since many countries are gradually increasing state retirement age. Population ageing is already putting state-provided pension provision under intense stress, with countries across Europe delaying access to benefits until older ages.

As older workers will constitute a greater proportion of the available workforce employers will need to adapt to accommodate the different needs of an older workforce.

While many stereotypical views pervade about older people, attitudes towards ageing and work are changing; with increasing numbers of employers regarding older workers as a valuable asset. There is still more that could be done within workplaces to dispel prevailing myths and to promote multi-generational working. A longer working life has implications for employers' health and safety responsibilities. Since the effects of some occupational exposures eg noise are cumulative, employers should take more affirmative action to control exposure at work to reduce health impairments at older ages, when they will have significant consequences to quality of life.

In some jobs, employers will have to consider providing reasonable adjustments to accommodate different worker requirements, particularly where there are heavy physical demands and long hours. That said, jobs should be made safe for all workers. In order for workers to remain productive there must be a good fit between work demands, their working environment and their bio-psychosocial needs.

While it is a fact that long-term health problems and chronic diseases are more prevalent in older populations the majority of older people are healthy and most people who have a long-term condition or disability manage to work. In most jobs, declining health or functional capacity has minimal impact on job performance or safety. Where there is minimal cognitive decline in the age groups to be considered, older employees use many tactics to compensate eg through experience and reduced errors. Relationships between age, health and employability appear to be weak. Health depends on many more factors other than age, such as lifestyle, job tenure and physical demands. Employers and their health and safety and occupational health services have much to offer with regard to ensuring proper risk assessments, fitting the task to individual capability and coaching people to lead healthy lifestyles throughout their lifespan. The older benefit from easy access to employer supported occupational health services and guidance on lifestyle factors – albeit the young benefit more. A person's health in older age is influenced by what they do when old, and significantly by their lifestyle and behaviours when young.

Chapter 1 – Introduction

The age structure of the world's population is changing rapidly and radically. A profound change is taking place in the balance between the numbers of younger and older people. This is the result of two firmly established and parallel trends: life expectancy is increasing and birth rates remain at historically low levels.¹ These trends are paralleled in the UK population² and in Europe.³ These changes are and will have a significant impact on those available for work in future years.

1.1 Changes in human populations

In the European Union (EU) life expectancy has been rising significantly for five decades. It rose by 8 years between 1960 and 2006. It is expected to increase by another 5 years by the middle of the century.³ Life expectancy at birth in the EU-28 was estimated at 80.6 years in 2013, reaching 83.3 years for women and 77.8 years for men.⁴ Secondly, the fertility rate in the EU has been declining since 1965 and was at its lowest at the beginning of the present century. However, in recent years the total fertility rate in the EU-28 displayed some signs of rising again. This development stopped in 2010 and a decline has been observed again since 2011.⁵ The result of the combination of these trends is that by the middle of this century there are expected to be 48 million fewer people aged 15-64 and 58 million more people aged 65 and over in the EU.³

Over the next 30 years or so the population of working age in the EU is expected to shrink at the rate of between 1 and 1.5 million each year. In parallel, the number of people aged 60 and over is expected to increase at the rate of about 2 million each year. There are no historical examples of age distributions where the oldest age groups are bigger than the younger.³

In the past, the UK population increased as a result of immigration predominantly from the Commonwealth countries. EU and UK immigration policies reduced this trend substantially in recent decades, whilst free movement with the EU became the main determinant of UK population growth. The consequences of the UK's EU referendum are as yet uncertain but it is anticipated that future immigration will reduce further. Immigration and mobility of labour can mitigate the effects of a shrinking working age population. However, it is generally accepted that immigration alone cannot rectify the expected imbalance between the working age and older populations.³

1.2 Ageing of the UK population

The population of the UK is ageing, and is at its oldest ever.⁶ This relates to both the increase in the average (median) age and in the number and proportion of older people in the population.

The median age of the UK population (that is the age at which half the population is younger and half older) was recently at its highest at 40, an increase of over six years in four decades.⁷ Life expectancy at birth is 79.1 years for males and 82.8 years for females.⁸ The latest data show that overall men can expect to live for a further 18.4 years and women 20.9 years. Across the UK countries, in mid-2014, the estimated median ages range from 38 (Northern Ireland) to 42 (Wales).

During the last century, there were peaks in the numbers of births after both world wars and a longer baby boom during the 1960s. The cohort of people born just after World War II are now aged in their late sixties and the 1960s 'baby boomers' are currently aged around 50. As these birth cohorts age further, they will contribute to the continuing ageing of the UK population.

The number and proportion of older people in the UK population, ie the population aged 65 and over, has grown by 47 per cent since mid-1974 to make up nearly 18 per cent of the total population in mid-2014, while the number of people aged 75 and over has increased by 89 per cent over the same period and now makes up eight per cent of the population.⁶

This growth of the older age groups has not happened equally for both sexes. Faster improvements in mortality rates for men mean that the number of men aged 75 and over has increased by 149 per cent since mid-1974 while the number of women in that age group has grown by 61 per cent. The faster improvement in male mortality is largely driven by changes seen in the reduction of tobacco smoking, and advances in health treatments for circulatory illnesses.⁶ Male occupations over the same period have also become safer and less physical.

The proportion of children in the UK population has fallen from over a quarter in 1974 to less than a fifth in 2004.⁷ This proportion is projected to continue to fall in future years, further reducing the working age pool of the future. The UK population is projected to continue ageing, with the average (median) age rising from 40.0 years in 2014 to 40.9 years in mid-2024 and 42.9 by mid-2039.⁹

The population projections also provide a picture of how the age structure of the UK population might develop in the future. Projected changes in the age structure are illustrated by the population pyramid in Figure 1. The projections must be tempered by the uncertainties of future immigration policy and numbers. This represents the population of the UK as estimated in mid-2014 and projected for mid-2039. Each bar in the pyramid represents a single year of age and the length of the bar relates to the number of people of that age in the population. The solid bars represent the estimated population for mid-2014 and the lines represent the projected population for mid-2039.



Figure 1: Age structure of UK population, mid-2014 and mid-2039

National population projections 2014. Office for National Statistics

The change in a population pyramid over time illustrates the impact of the demographic factors of ageing, births, deaths and migration. The pyramid for 2014 shows: a sharp spike in the population for those aged 66 and 67 years old, which reflects the high numbers of births in the period immediately after World War II; the wider area of the pyramid for those aged around 45 to 55 who were born during the baby boom of the 1960s; the sharp narrowing of the pyramid for people aged around 12 years, a consequence of low numbers of births just after the turn of the millennium; the increasing broadening of the base of the pyramid from the higher numbers of births in recent years; and females outnumbering males at older ages, reflecting their historically higher life expectancy. The pyramid for 2039 shows that the number of children is projected to increase, as is the older population largely attributable to the baby boomer generation, while the working aged population will remain broadly similar.

1.3 People of working age and state pension age

The proportion of the UK population who are of traditional working age (16 to 64) has remained relatively stable over the last 40 years, but is projected to decline in future years.⁷ Many people retire before state pension age while others work beyond it.¹⁰ The average age at which people leave the labour market rose from 63.8 years to 64.6 years for men and from 61.2 years to 62.3 years for women between 2004 and 2010.¹⁰

UK population estimates record that almost three million women are aged 60 to 67 and almost 1.1 million men are aged 65 to 67, ie people previously outside the traditional working age population.¹¹ Since 1971, the UK population has increased by around 15 per cent, but the number of men aged 65-67 has increased by 42 per cent and the number of women aged 60-67 by 11 per cent.¹¹

Despite increases to the age at which state pension can be claimed, the number of people claiming is projected to increase by 32.7 per cent from 12.4 million in mid-2014 to 16.5 million by mid-2039.⁹

The number of people of pensionable age for every thousand people of working age ie the Old Age Dependency Ratio was 310 in 2014. This is projected to fall to 284 in 2020 as a result of increases in the state pension age, then rise to 370 in 2039. There will be more people of pensionable age relative to those of working age in 2039 than in 2014.⁹ Projections make assumptions about demographic factors, including net migration. These projections pre-date the UK's EU referendum and do not factor in future restrictions on working-age migrants.

The ageing population and shrinking working-age population is a major challenge for the decades ahead. It does not make economic growth easier, at least in the way growth has been traditionally understood.³ That people are living longer also raises questions about pressures on pension adequacy.

1.4 International Perspective

Globally, life expectancy has been improving at a rate of more than three years per decade since 1950, with the exception of the 1990s. During that period, progress stalled in Africa because of HIV; and in many ex-Soviet countries following the collapse of the Soviet Union. Life expectancy increases accelerated in most regions from 2000 onwards, and overall there was a global increase of five years in life expectancy between 2000 and 2015, with an even larger increase of 9.4 years in Africa.¹ Recent increases in life expectancy in developing regions are due in part to reduced child mortality and in preventing new infections and in extending the lives of persons living with HIV through anti-retroviral therapy.¹²

While significant differences in life expectancy across major areas and income groups are projected to continue, they are expected to diminish significantly by 2045-2050.¹²

Economic development in these countries may reduce emigration, both legal and illegal, to more developed nations in the future.

1.5 Summary

- The number of older workers in the UK, and across the EU, will rise significantly in the next 30 years
- The current projected population in the UK by 2030 will be 70 million, a similar demographic change to the rest of Europe
- Currently, only around 57 per cent of people in the 55-64 age group are in work
- Many people retire before state pension age while others work beyond it
- Whilst immigration from (mainly) the EU has been filling many vacant roles, leaving the EU
 and immigration controls are likely to reduce the numbers of young, new migrant workers
- UK workers will have to work longer than currently, and to an older age, to meet the projected demands of the labour market, the requirements of the economy and the need for income before full retirement

Chapter 2 – Attitudes and perceptions

In society peoples' perceptions of ageing are frequently based on stereotypes and myths, which tend to be fixed beliefs and which are assumed to apply to everyone.¹³ There are positive, neutral and negative elements in peoples' perceptions about ageing and older people. However, more negative descriptors are associated with older people.¹³ At work older people often face negative attitudes in the labour market – from employers, colleagues or from the services intended to support them. Negative attitudes include the idea that older workers are slower, are less adaptable to technological changes, less able to learn new things, less motivated, resistant to change, and prone to untreatable and work-limiting conditions.^{13,14} Many of these attitudes are shaped by out of date experiences of yesterday's 'older workers' in yesterday's jobs and their expectations about work.¹⁵ Conversely, positive perceptions include that older workers are loyal, reliable, dependable, experienced and make fewer mistakes.¹³ Age stereotypes can influence management decisions and can have implications for recruitment, retention and reward of individual employees.¹³

2.1 Employers' opinions of older workers

Older adults are often discriminated against in the workplace on the basis of inaccurate stereotypes about ageing. Many of these stereotypes may not recognise the benefits of employing older workers. Given the changing demographics described in Chapter 1 and legislation against age discrimination in employment (Equality Act 2010) it is important to understand the way that age and older workers are perceived.

The age at which workers are considered to be "old" by employers is changing. One study reported that the proportion of employers who considered employees over the age of 55 to be old fell from 60 per cent in 2001 to 43 per cent in 2008.¹⁶

Age may be an important influential factor in perceptions about ageing.¹³ It appears that older employers (over 60 years) have a more positive view of older workers, whilst employees under 30 years tend to consider that a worker is old before 60.¹⁷ This influences perceptions about productivity. Among Dutch employers and employees, the older the respondent the more positive the perception is of older workers' productivity. The younger the respondent, the more positive the perception is of younger workers' productivity. Employers under age 35 appeared to have the lowest opinion of older workers' productivity.¹⁷ Opinions about older workers also vary according to the characteristics of an enterprise e.g. older workers are viewed less positively in enterprises where the workforce is expected to decline in the next few years and in those where older workers already represent a larger proportion of staff.¹⁷ A meta-analysis evaluated empirical evidence for six common negative stereotypes i.e. that older workers are:

- less motivated
- generally less willing to participate in training and career development
- more resistant and less willing to change
- less trusting
- less healthy
- more vulnerable to work-family imbalance¹⁸

The authors found empirical support for only one of those stereotypes ie that older workers are less willing to participate in training and career development activities. However, the stereotype may overstate the degree to which age negatively influences willingness to engage in further self-development.¹⁸ In a recent survey of UK employers two-thirds did not agree that older workers are less willing to undertake training to learn new skills.¹⁹ Other sources report high interest amongst older employees, but difficulty in gaining access or finding training that addresses their needs. The scarcity of social precedents for older worker training and development is said to be a contributory influence.²⁰

2.2 Positive perceptions

A quarter of interviewed employers expect that the proportion of older workers in their enterprise will rise in the next five years and about three-quarters accept this to be a positive development for staff experience; this would also be of benefit to the enterprises' skill resources and the transmission of know-how. Most employers believe that the main assets of the older worker are:

- experience
- know-how
- conscientiousness
- timekeeping
- dynamism¹⁶

Most employers surveyed thought that increased numbers of workers aged over 50 would not negatively influence younger workers' careers, work organisation and labour productivity.¹⁶ Another survey suggests that there is value in retaining the skills and experience of older workers.²³ French private sector employers reported that experience, common know-how and conscientiousness were the main assets of older workers. They were particularly well regarded for timekeeping, motivation and dynamism.¹⁶ A Department for Work and Pensions 2015 survey of almost 700 employers reported that the most frequently cited main benefits of workers aged 50 or over were experience, reliability and the mentoring they could provide to new workers.¹⁹

2.3 Negative perceptions

There is a perception that older workers are reluctant to adapt to change and to new technologies. They are seen as more expensive than younger workers and employers have concerns about their health and mobility.¹⁶ An Economist survey also demonstrated some negative views among respondents; the mostly strongly held being: ²¹

- 59 per cent expect the cost of benefits as a percentage of salary to increase
- 55 per cent believe that the cost of providing healthcare benefits will increasingly fall on the employer
- 43 per cent expect employee demand for healthcare and retirement provision to grow
- 40 per cent believe their current benefit package will not be fit for purpose by 2020

Employers are becoming increasingly aware of the health picture for the ageing workforce and the cost implications.²² However, the views of employers are quite varied as shown in Figure 2.²¹



Figure 2. Employers' perceptions of older workers

2.4 Workers' perception of ageing, health & capability

A European Union survey showed that 63.9 is the average age at which one starts to be regarded as "old", but there is a difference of more than 10 years between countries (70.4 years in the Netherlands and 57.7 years in Slovakia).²³ Perceptions of old age also vary according to the age of the respondents. As the age of an individual increases, so does his/ her views about when old age begins. 15-24 year olds believe that old age begins at the age of around 59 whilst those over 55 years consider that old age begins at around the age of 67. Women feel that old age begins slightly later than men (65 years vs 62.7 years).²³

Myths and facts about older employees and their physical and mental health and disabilities have been mapped in the Netherlands.²⁴ This research revealed a gap between opinions and facts regarding the health and employability of older workers. People believe that all employees have declining physical health due to chronic disease, such as heart problems and other complaints from physically demanding work. However, the facts are that a large majority of older employees enjoy good physical and mental health and work very well until the ages of 65-70 years (see Chapter 3).

A Eurobarometer study reports that the proportions of workers who expect to be able to work to the age of 60; beyond 65; and until or beyond 70 are 70 per cent, 42 per cent and 10 per cent respectively.²³ This varies between European countries and by the type of job. Manual workers on average believe they will only be capable of doing their job until about 60 years compared with an average age of about 65 years for the self-employed. Older respondents have much more positive perceptions of older people in the workplace. Almost 90 per cent consider that the main perceived advantage of employees 55 years and older is that they are thought to be more experienced than younger employees. Two-thirds consider that they are more reliable and are better able to make independent decisions. A similar proportion feels that they are better at problem solving. A half of respondents believe that those over 55 years are better of respondents believe that older people are less open to new ideas or to changes in technology.²³

The body of research has shown that attitudes and stereotypes about older workers are mixed. Overall it is likely that older workers are not viewed entirely negatively in the workplace, rather, the perceptions of older workers are more varied, and even positive in some cases.^{17,25} In a recent survey of employees aged over 50 almost a quarter thought their employer viewed older workers 'less favourably than younger workers'. However, just over half thought older workers were viewed 'as favourably as younger workers'. Relatively few thought that their employer viewed older workers 'more favourably than younger workers'.²⁶

2.5 Summary

- Research suggests that employers may hold stereotypical views of the abilities and attitudes of older workers
- Generally, these stereotypes are not consistent with the cumulated research evidence.
 For example, while it is generally believed that the health and employability of workers declines with age in fact only a minority of older people of working age decline physically and/or mentally
- One of the challenges for the future is in tackling the prevailing myths and prejudices and addressing the negative stereotypical views relating to older workers

Chapter 3 – Biological effects of ageing

Chapter 2 discussed perceptions of workers including views of whether or not they are less productive than younger workers. Such perceptions depend in part on people's understanding of the normal ageing process; every day visible signs of functional impairment ie the need to wear reading spectacles; and individuals' experiences of the health of older family, friends and colleagues among whom certain common medical conditions eg cancer, cardiovascular disease, degenerative joint disease, dementia, and type 2 diabetes can be more common. In this chapter we discuss the extent of these changes, and the significance, if any, to work and to longer working lives. However, specific evidence about people working into their sixties and beyond is limited.²⁷

3.1 Functional impairment

Structural and sensorineural degeneration occurs throughout the auditory system causing age-related hearing loss (presbycusis) and age-related balance problems (presbystasis). Varying degrees of presbycusis are experienced by older adults, often with tinnitus, and the rate of progression of hearing loss is worsened by occupational exposure to noise. The rate of vestibular neuro-epithelial degeneration appears to be low during the normal ageing process.²⁸ Nevertheless dizziness is common in adults; 25 per cent of people aged 65 to 69 years reported dizziness in a small study.²⁹ Benign paroxysmal positional vertigo is the commonest cause of dizziness at all ages and peaks at about 60 years. Meniere's disease is the second commonest cause in older people. It affects the middle-aged but remains common in older people either as ongoing or as de novo disease.³⁰

Worldwide 65 per cent of visually impaired and 82 per cent of all blind people are aged 50 years and over, with cataract accounting for more than half of all blindness.³¹ Age-related visual changes include presbyopia and impaired contrast sensitivity, dark adaptation, colour discrimination and peripheral vision.^{20,32} Additionally, cataracts, glaucoma, macular degeneration, retinal detachment and vitreous separation are more prevalent with increasing age. Impaired vision may affect close, detailed work, display screen use and safety critical tasks, but need not affect job performance and in most cases is overcome by corrective eyewear or adaptive technology.

The respiratory system reaches maximal function between the ages of 20 to 27 years; thereafter lung function decreases progressively. Cross-sectional and longitudinal studies show an accelerated decline in FEV1 and FVC with age. The annual decrease in FEV1 is approximately 20 mls in those aged 25 to 39 years, rising to 38 mls in those aged 65 years and over. However, in the absence of disease, the respiratory system remains capable of maintaining adequate gas exchange during the entire lifespan.³³

Muscle strength and aerobic capacity decline progressively with age. While much variation exists, on average this reduces physical capacity by 20 per cent between the ages of 40 and 60 years.³⁴ Muscle strength peaks around the third decade; is maintained until 45 to 50 years of age; and declines at an average rate of 12 to 15 per cent each decade thereafter.³⁴ Aerobic capacity also declines progressively after the age of 30³⁵ by 10 per cent per decade.³² Those who use physical strength in their jobs retain better strength than those who do not,²⁰ while an active lifestyle helps to preserve some aerobic capacity.³² There is little evidence that these declines in muscle strength and aerobic capacity adversely affect performance.³⁵ Reduced physical capacity is only problematic in jobs with high physical workload. In these conditions older employees may benefit from longer recovery periods. In most cases people should be capable of continuing to work in their roles despite an increased retirement age.²⁰

While age-related cognitive decline may commence in the third decade the deterioration is not generally marked before the age of 70, and possibly older, with only five per cent of people over 65 showing any sign of cognitive impairment. Moreover, language ability and the ability to process complex problems improve. In most cases serious decline in memory or intelligence is not apparent until the age of 85.²⁰ The onset and impact varies considerably between individuals and can be influenced by lifestyle factors eg regular physical activity is positively associated and sedentary behaviour is negatively associated

with cognitive function over the lifespan.³⁶ For most people in their sixties any impairment in mental ability and mental agility is slight, and the effects are offset by experience and established skills. The main finding is that healthy older people perform equally as well as their younger counterparts.²⁰ Little evidence exists showing cognitive changes affecting job performance or safety in workers aged 60 years and over, although mixed outcomes are seen for driving safety.²⁷

It is important to note that laboratory tests used to investigate cognitive decline are rarely representative of the capacities and functioning required in the work environment. While studies demonstrate slower reaction times with increasing age, caution increases with age so there is a trade-off between speed and accuracy which reduces the frequency of possible errors.³² Reduced reaction times may only be a problem in high-risk environments; however, the evidence related to professional drivers and pilots is that slower reaction speed is compensated for by experience. The probability of accidents or errors among those in their sixties is below that of drivers in their twenties and similar or better than that of drivers in their thirties and forties.²⁰ Driving accident rates do go up with increasing age in the general population, but this does not seem to be reflected among professionals, perhaps because they continue to drive on a regular basis, while driving declines in the general population, particularly after retirement.²⁰

As noted in Chapter 2 some employers are sometimes concerned that older workers are less productive. However, there is no consistent evidence that older workers are less productive than younger workers.³⁵ Most reviews conclude that job performance is generally the same across age groups. When abilities match job requirements and when experience is considered, there is little difference between the performance of older and younger workers. Performance need not decline with age because most jobs do not require employees to work at full capacity, except those that are persistently arduous.³⁷ Strategies, skills and experience can compensate for functional declines; and there is great variability in capabilities between individuals. As well as there being little evidence that performance of core skills declines with age, there appears to be evidence that other aspects of performance such as good timekeeping, helping co-workers, better anger management and people skills increase with age. Some studies have also shown that older workers perform better in terms of accuracy and output consistency.³⁵

3.2 Health conditions

The prevalence of long standing illness or disability increases with age and in the British working population is approximately one in five 16-44 year olds; a third of 45-64 year olds; and one half of 65-74 year olds.³⁸ The rates for the most common conditions by age are shown in Table 1. Long-term conditions need not prevent people from working, or affect their performance at work. Among people of working age around 60 per cent of those who have long-term conditions and 46 per cent of those disabled within the meaning of the Equality Act 2010 are in employment.³⁹ Multi-morbidity is the norm for people with chronic disease, and although its prevalence increases with age, more than half of all people with multi-morbidity are younger than 65 years. The most socioeconomically deprived young and middle-aged people have substantially more multi-morbidity than do their most affluent peers.⁴⁰



Table 1. Rate per 1,000 Britons reporting long-term conditions and age³⁸

Self-reported ill health is subject to bias; however, the trend in cardiovascular disease is supported by GP recorded disease in England which estimates prevalence of around four, 10 and 28 per cent at ages 16-44, 45-64 and 65-74 respectively.⁴¹ The incidence of cancer increases noticeably with age (Table 2). From the age of 50 prostate and breast are the most common cancers for males and females respectively and colorectal cancer is common in both sexes.⁴²

More common gender specific issues include benign prostatic hypertrophy (BPH) and the menopause. The negative impact of these conditions on quality of life is likely to be overlooked by those who have not experienced the symptoms. It has been noted that in the workplace, the management of gender-specific health issues other than pregnancy are rarely discussed.⁴³ Estimates of the prevalence of BPH causing significant symptoms, including frequency, urgency, and nocturia, vary considerably but all show an increasing prevalence of symptoms with age, especially for men aged over 50 years. Analysis of the UK General Practice Research Database (GPRD) demonstrated that the age-specific incidence of reported symptoms showed a strong linear increase from around 3.5 per cent for patients aged 45-49 years to over 30 per cent for patients aged over 85 years.⁴⁴ Community-based questionnaire studies report higher prevalences since patients may not consult their general practitioner. Indeed, medical records from the GPRD suggest that some men do not seek medical advice until they have acute urinary retention.⁴⁴

Around 75-80 per cent of women of menopausal age are in work.⁴⁵ Typically the menopause commences between the ages of 50 to 51 years and lasts for four to eight years. Consequently at any one time a significant proportion of older female workers will experience symptoms which might feasibly impact on working life.⁴³ An electronic questionnaire survey of women aged 45 to 55 years in professional, managerial and administrative occupations in 10 UK organisations reported that when asked how difficult it was to manage work during menopausal transition, five per cent stated it was 'very or extremely difficult', 48 per cent reported it was 'somewhat or fairly difficult', and 47 per cent found it 'not at all difficult'.⁴³ The most problematic symptoms were: poor concentration, tiredness, poor memory, feeling low or depressed and lowered confidence. Hot flushes were particularly difficult. The majority of women were unwilling to disclose menopause-related health problems to line managers, most of whom were men or younger than them.⁴³





Generally the prevalences of common mental health problems eg anxiety and depression increase until about the sixth decade, but then decrease during the ages 60 to 75 years.^{46,47} Similarly the prevalence of work-related stress appears to peak in the early fifties and declines thereafter.⁴⁸ Several factors may account for this: older workers may be more senior and have greater control over their work; they may leave stressful work for other jobs, or they may have better coping strategies.⁴⁸ Large numbers of the over fifties cite work-related stress as an important criterion in their motivation to withdraw from employment²⁰ hence older workers may represent a healthy survivor population.⁴⁸

3.3 Sickness absence

Sickness absence can be measured by frequency (spells) and by duration of absence (days). It is generally the case that younger workers have more spells of short-term sickness absence than older employees. Since degenerative disorders eg cardiovascular and musculoskeletal problems present or worsen in later life older workers are more prone to longer-term or certified sick leave.^{20,35} To some extent comparisons of sickness absence by age are complicated by the fact that older employees represent a survivor population.²⁰ Inconsistencies in the evidence obtained from primary studies may be attributable to differences between study populations ie health, industry and a person's job (eg whether they have a physically demanding role). The balance of evidence suggests that older workers do not have a greater sickness absence pattern than younger workers.³⁵

There is less evidence regarding presenteeism, although it is reasonable to assume that since the prevalence of several long-term conditions increases with age that this is likely to be an issue. In a study of people with self-reported peripheral joint osteoarthritis from five European countries including the UK, of those in employment seven per cent reported absenteeism and 24 per cent presenteeism.⁴⁹ Surveys also indicate that rates are comparable to, and possibly higher than, the wider population and that presenteeism may be a compensation behaviour to avoid giving colleagues and managers the impression that they are not fit for work due to their age.²⁰

3.4 Shift work

Trends in workforce demographics indicate that shift work by those aged 65 years and older will increase. It must be noted that research of so-called 'older' shift workers involves younger workers of 40-55 years.²⁷ Whilst some primary studies suggest that shifts longer than eight hours can be detrimental to older workers health, higher quality evidence (systematic reviews and meta-analyses) find no association with age.²⁰ It is likely that the cumulative effect of the number of years spent working shifts is more important than age in predicting ill health effects.⁴⁸ Ageing is associated with changes in circadian rhythm such that people feel more active in the morning, and are better able to cope with early shifts.³⁵ Unsurprisingly there is some evidence that older workers' performance is adversely affected by night shifts, whilst younger workers' performance is adversely affected by morning

shifts.²⁰ Time needed for recovery tends to increase with age; this is particularly relevant in the context of extended (eg 12 hour) shifts.²⁰ Older people are thought to experience greater disruption to circadian rhythms, as well as physiological fatigue from working extended shifts. There is consensus that older people need a longer recovery period, particularly from shifts of 12 hours or more.²⁰

3.5 Occupational injury

There is also evidence that older people need longer recovery times from accidents and injuries. A systematic synthesis of the literature reported that the most frequently identified predictors of prolonged disability were older age and greater baseline pain and functional disability.⁵⁰ Systematic reviews report that older workers are at less risk of accidents than younger workers, but where they are involved in accidents they are more likely to involve serious injury or be fatal.^{20,27} Recent US data reports that workers 65 years or older have three times the risk of occupational fatalities; falls, slips and trips accounting for 27 per cent of fatalities, compared to 17 per cent among the entire workforce.⁵¹ Differing rates of non-fatal injury between older and younger workers may be largely explained by industry, occupation and experience. When workplace injury rates are adjusted for other factors, such as occupation, age has no significant influence on the risk of workplace injury. The most important factor contributing to the risk of workplace injury is occupation.³⁵ A review concluded that the prevalence of work-related musculoskeletal disorders is higher among older workers, however, there is no conclusive evidence that age by itself is a risk factor.⁵² The key determinant is not age, but adverse working conditions, including physically demanding work, repetitive work under time constraints, working in awkward postures and high job demands.⁵²

3.6 Summary

- There are wide individual differences in functional abilities at any given age and the impact of ageing is minimal among those of working age
- Diminished cognitive capacity is slight for most people in their sixties and effects may be offset by experience and established skills
- In most jobs declining health has no impact on job performance; many jobs and work environments can be adjusted for emerging disabilities
- Chronological age is not the most important determinant of health and ageing does not inevitably lead to illness
- The biological effects of ageing can be moderated by increased physical activity, intellectual activity and other lifestyle factors
- Although the risk of long-term conditions may increase with age the majority of older workers enjoy good health and most people who have long-term conditions or disability continue to work
- Older workers do not take more sickness absence than younger workers
- Work demands and psychosocial factors may have a greater influence on the risk of developing work-related ill health than age
- In summary, relationships between age, health and employability appear to be weak

Chapter 4 – Occupational health and safety needs

Occupational factors which influence whether an older worker remains in work or retires include the availability of employment that meets personal needs and inclinations, and whether there is a good fit between job demands, working environment, individual circumstances and capability. ^{20,53} The impact of age on performance and safety has been studied far less than functional capacity and work risk factors.^{32,54} Analyses of factors associated with work accident or injury in workers aged 65 or over are scarce.^{27,55} Studies that consider age are heterogeneous with regard to definition of the aged worker; stratification by age group; and measurement techniques.²⁷ In many studies large inter-individual differences observed within an age band can exceed differences between age bands.^{27,54} Furthermore, with strong evidence that work is generally good for health and wellbeing for all age groups, and with most individuals across all working age groups with impaired health or a decline in physical capacity remaining in work, there is little evidence that age per se is a strong determinant of workability.³⁵ Workability is a multidimensional concept depending on a worker's health and functional capacities, their competencies, values, attitudes and motivation, their family life and close community, their external environment, as well as aspects of working conditions and work organisation.⁵⁶ A systematic review reported that of seven studies examining mostly subjective assessments of workability and age: four identified a decrease with age; two showed no association with age; and one reported that workability increased with age for healthcare shift workers (demonstrating a healthy worker effect).⁵⁴ Despite the differences between these studies and others, some consistent general conclusions can be drawn.

4.1 Risk assessment and risk management

The Management of Health and Safety at Work Regulations 1999 (and other specific regulations) make more explicit the general requirements of employers under the Health and Safety at Work, etc Act 1974. They encourage a systematic approach to health and safety management and require employers to put in place health and safety measures that follow from a suitable and sufficient risk assessment. So what, if any, is the evidence for age-related vulnerabilities that require assessment and intervention in the workplace?

- General: there is little direct evidence concerning safety practices and health risks in workers aged over 60.²⁷ While age and capacity to work are inversely associated for some workers it is not that simple; the variation between individuals is large and is affected by lifestyle, non-work stress, and the availability of occupational health support.⁵³ Also workability is maintained in individuals in roles with high autonomy and higher mental involvement^{32, 54}
- Diminished capacity and cognition: as noted in Chapter 3 cognitive impairment is slight for most people aged 60, with any work impact offset by experience and established skills.²⁰ Age-related mental or physical decline does not negatively impact work or safety where abilities are matched to job requirements and expertise is taken into account. Strategies, skills and experience compensate – although compensation is less with lower job control⁵⁵ or where fast reactions or physical strength are required.²⁷ Decision making is not significantly different in those over 65 in work than in those under 50. Evidence indicates that complex work helps reduce cognitive decline in addition to any compensating strategies.²⁷ Higher levels of mental work demands, occupational complexity or job control are associated with higher levels of cognitive function in later life, but the evidence that this protects against cognitive decline later in life is much less clear-cut⁵⁷
- Driving: ageing brings decrements in perceptual process, visual acuity, contrast sensitivity and impaired judgement of depth and distance. These changes are not reflected in reductions in driving skills or in accidents. Driving skills are linked to reduction in cognition rather than age, and length of driving experience compensates^{27, 58}

- Sensory changes: Hearing impairment increases the risk of injury and accidents at work for all age groups. There are additional safety risks associated with age-related hearing loss. Presbycusis can unmask noise-induced (or other) hearing loss and lead to difficulty hearing instructions or alarms. An increase in passive accidents and in same-level falls are noted with hearing loss in the presence of noise exposure.²⁶ This is offset by work experience. Even slight noise-induced hearing loss, in the presence of (occupational) noise exposure, can reduce safe operation of motor vehicles, increase accidents and highway code violations. But, the oldest workers also have the fewest accidents, with driving and work experience compensating as previously noted. Impaired balance is a concern for those working at heights or in charge of vehicles if there are rapid head movements, although balance training may partially offset this.^{32,55} Decrements in visual acuity can largely be overcome with improved general or task lighting, visual correction and support from technologies (larger screens, changing font size, contrast, etc)^{20,32,35}
- Shift work and overtime: although age-related decreases in workability are more pronounced in shift workers compared to day workers, and prolonged shift work is detrimental to health across all age groups, there is no strong evidence that:
 - work patterns, including shift work or overtime, in older workers impact negatively on safety
 - shift work or overtime affects those aged 65 more than those under 50

moderate overtime is associated with worse health outcomes in older age groups^{20,27,58}
 Protective compensatory strategies and experience may maintain safe working practices, particularly where sleep disruption is minimised

- Heat: older workers are more susceptible to heat-related problems; however, in the
 absence of illnesses that impact thermoregulatory control, older workers are no
 less tolerant of thermal stress than younger workers.³² Any conditions which affect
 thermoregulatory control can be screened for and controlled, and experience and selfselection compensate
- Musculoskeletal/Ergonomics: jobs with increased physical demands, poor posture and poor ergonomic conditions are associated with reduced workability in some studies.⁵⁴ Reduced aerobic capacity can be problematic when machine-paced work is set for younger age groups, but this impact is mitigated by high physical activity and selfselection.³² However, there is as much variability in physical strength within older and younger aged cohorts as there is between them²⁰, and workplace demands are a bigger issue than age with respect to musculoskeletal conditions at work.³⁵ It is important that manual handling risk is managed for all workers. Increasing physical activity, ergonomic interventions, workstation improvements, training and awareness can reduce risks from poor posture or physical work^{32,58}
- Stress: decreased workability is associated with high mental work demands in most studies reviewed. But, accepting that there may be a healthy worker effect, the evidence suggests that workers over 60 cope better with work and its associated stresses than younger age cohorts – education, work experience and autonomy were protective factors²⁷
- Safety critical roles: the impact of age-related changes on safety critical work has been studied in emergency services, aviation, construction, driving, mining, nuclear, offshore and oil industries.⁵⁵ Risk is increased slightly in these activities, impacted by reduced physical performance capacity, with older workers being exposed less to certain critical tasks (difficult work conditions being harder to bear with ageing). Aside from huge inter-individual variation, there is little significant risk from age-related changes in safety critical roles. The following should be considered when assessing risk:
 - expertise and experience of the individual particularly domain specific expertise
 - fatiguability
 - mental and cognitive demands
 - emotional demands
 - physical demands
 - task demands
 - task duration/time on task
 - work related psychological complaints
- work organisation shift, role conflicts, control, fear of failure, lack of recognition
- work situation/environment stressful situations, temperature, new technology

Whilst domain specific expertise protects against performance decrement, performance can be reduced when the task or environment is changed, although lack of familiarity can be countered by training.⁵³

Good health and safety risk management includes job specific assessments for older workers to ensure the environment and work practices are safe taking into account any vulnerabilities. The safety risks arising are often small and tempered by experience and knowledge. Support from supervisors and line managers (who may also need training and support) is important in designing the day-to-day job demands, organisation of work and shift rotas³² or in facilitating a move by the older worker into supervisory or training roles³⁵ or by ensuring suitable workplace adjustments. Other actions managers and supervisors can take to support performance and reduce risks of injury and illness in older workers include minimising monotonous work and short cycle times, and improving work task design, control over work, visibility of task related information, work scheduling, work rate and production targets. The key considerations can be summed up by awareness and flexibility underpinned by people-friendly workplace policies that consider the changing needs of the ageing worker.^{20, 35}

4.2 Occupational Health: interventions and support

The dominant finding from the literature is that healthy older people with current skills perform as well at work as their younger counterparts.⁵³ The same review notes that of National Health Service (NHS) staff aged 50 or over, 40 per cent report ongoing ill health, and 15 per cent of leavers cite ill health as the reason for their exit from the labour market. Another review reported a lack of interventions that specifically targeted occupational health issues faced by ageing workers or those with age-related disease.⁵⁸ However, this review noted the success of occupational health interventions where organisations had a proactive and integrated approach to occupational health and safety management. Another review found that occupational health interventions reduce the risk of early retirement.³²

Workability has been observed to be reduced in the overweight and in those physically inactive in their leisure time.⁵⁶ Age-related declines are moderated by higher physical activity, intellectual stimulation and other lifestyle factors.^{32,59} Many health interventions work for all ages, and not only the older worker. In many the benefits are greater in the young, although the perceived benefit is often greater in older age groups, impacting positively on motivation and engagement.⁵⁸ Lifestyle interventions ie improving diet and physical fitness, reducing smoking and alcohol consumption, and attention to other lifestyle factors implicated in the development of chronic disease are all viewed positively provided they are applied equitably.^{20,32,58} The benefits to health and workability from stopping smoking are seen across age groups.³² Optimising shift patterns to minimise sleep disruption benefits all age groups, although it has a greater impact on general health in younger groups.³² Ergonomic training is associated with improvements in perceived stress, job satisfaction and motivation. Stress risk reduction strategies improve coping strategies, particularly important in those with low social support.⁵⁹ Counselling support and health screening are also viewed positively.

III health can be controlled or supported in the workplace with adjustments to role, the workplace or by expanding training or re-skilling.^{20,58} There is good evidence that supporting workers with chronic health conditions to self-manage their health at work – particularly controlling pain and fatigue – improves job retention and return to work.⁶⁰ Focus on those whose lifestyle factors place them at risk of developing chronic disease (smoking, nutrition, obesity, cardiovascular risk, etc.), through education and training, support, health checks and interventions improves workability, as does access to specialist treatment, counselling and multidisciplinary rehabilitation programmes for those on sick leave.⁵⁸ However, studies of interventions (and reviews of interventions) have focussed on health promotion, rather than the prevention of occupational disease.

Older workers bring many benefits, yet employers have underestimated the costs of failing to retain experience, and have under-invested in training for the older employee.^{20,53} Multi-generational teams have greater strengths than single age teams, but require more careful management, yet there is a general lack of awareness amongst managers and colleagues

of age management strategies,^{20,53} which are discussed in chapter 5. There is a call for occupational health to move from a "depreciation" model to a "conservation" model in worker performance,²⁰ to expand access to occupational health support for older workers and for the increased use of flexible workplace policies.¹⁴ The challenge is for occupational health services and employers to adopt a proactive approach focussed on prevention of harm and promotion of wellbeing through systems of work and individual support. High risk or vulnerable groups should be identified by job role and impact mitigated through risk assessment; with suitable changes in design or configuration of work, flexible or reduced hours and attention to ergonomics.²⁰ Factors that support this are:

- easy and early access to good quality (specialist led) occupational health services
 with self-referral
- fast track access to health and wellbeing support, counselling and physiotherapy
- targeted advice for older workers on health, diet and other lifestyle factors, and effects of drugs on ability to work safely
- encouraging physical activity
- specific condition support (eg menopause)

All staff should be supported by high quality programmes that protect and promote health, safety and wellbeing throughout their working life.^{53,61} Employers may be assisted in assessing the status of their current support for older workers by a checklist produced for use within the NHS.⁶²

4.3 Summary

- Work capacity or job performance in the ageing worker is multifactorial involving an interaction between functional capacity, health and the nature of the work
- There is little age-stratified evidence, but what there is suggests that in the absence of illness, workers aged 65 are at no worse detriment than those aged 50. There may be a healthy (safe) worker effect operating in some areas through self-selection
- In general, what benefits younger age groups also benefits the older age groups, and may be better perceived (although the benefits may be greater in the young)
- There are few age-related risks not countered by experience, expertise and knowledge
- Individual support for those at risk from lifestyle factors of developing chronic disease has been shown to be beneficial in improving workability and reducing absence
- Attention to workplace and task design and adoption of flexible policies are key strategies to support the retention of the older worker in work
- Access to high quality occupational health support with health promotion programmes, access to physiotherapy and counselling all promote employment longevity and staff engagement
- Age-associated functional declines (and the accompanying risk of work-related injury) can be prevented or at least delayed by regular physical activity

Chapter 5 – Active age management at work

More and more workers are delaying retirement partly due to the increased state pension age but also because work contributes to shaping identity, boosts self-esteem, and generates interpersonal contacts and income.⁶³ Conversely people who could afford to retire but who would work reduced hours if it were available might feel compelled to retire in the absence of flexible work policies. Employers need to be aware that losing older employees to retirement drains knowledge and expertise. Older workers may have health problems (see Chapter 3) or multi-generational caring responsibilities. The demographic changes described in Chapter 1 and these few individual scenarios demonstrate that, additional to addressing the health and safety needs described in Chapter 4, employers' HR programmes must adapt to meet the needs of ageing workforces. Tackling barriers to the employment of older people requires action on several fronts: the quality and flexibility of jobs; access to occupational health services; retirement and pension policies; and attitudes and assumptions about older workers. Many older people wish to carry on working or begin new careers, but often face obstacles caused by stereotyping and inflexibility. The challenge is to find ways to remove barriers and promote a less ageist society.⁶⁴

5.1 Active ageing

Active ageing is defined by the World Health Organization as the process of optimizing opportunities for health, participation and security in order to enhance quality of life as people age.⁶⁵ It applies to both individuals and population groups. Active ageing allows people to realize their potential for physical, social, and mental wellbeing throughout the life course and to participate in society.⁶⁵ In the context of Europe's ageing population, this means encouraging older people to remain active by working longer and retiring later, by engaging in volunteer work after retirement and by leading healthy and autonomous lives.⁶⁶

Governments have responded to the need to extend working lives in the main by increasing the retirement age and the age at which state pensions can be drawn. In the UK, it is expected that employment rates of both genders will increase but that the equalisation of the state pension age will have the greatest effect on single females.⁶⁷ A 2009 survey in eight European countries including the UK found that only a minority of employers applied measures to recruit or retain older workers, and employers tend to retain rather than hire older workers.⁶⁸ The extent to which the macro-level goal of extending working lives can be achieved depends especially on employers' behaviour. This is at a time when employers are increasingly under pressure to reduce costs to improve competitiveness. One approach to reducing costs and headcount is to offer early retirement to workers.⁶⁹

5.2 Challenges faced by employees

In a telephone survey of 1,500 people one-quarter of men and two-thirds of women said that they want to remain economically active beyond state pension age: and three-quarters of those would like to continue working for their current employer. However, structural and attitudinal barriers thwarted the ability of many to stay involved.⁶⁴

A quarter of women and a sixth of men aged 50 to 64 have informal caring responsibilities for a sick, disabled or elderly person. People in late middle-age are often caught between generations of family members requiring care: parents and in-laws, spouses or partners, children or grandchildren. Difficulties managing these responsibilities alongside work can lead to an early exit from work.⁷⁰

Flexible working is becoming an increasingly effective and popular practice that suits a whole range of cohorts in the workplace, especially working parents and older workers who might be caring for elderly relatives.²² Recent surveys among British employers have produced varying results with between a third to almost two-thirds of surveyed employers reporting offering non-standard working hours arrangements for at least some employees.^{19,71} Within Europe one in six employers surveyed used early retirement as a means to reduce costs.⁶⁸ A survey of companies employing in total 3.4 million workers revealed that most companies do not reference age specifically in their company values, but two-thirds do include age in diversity and inclusion policies. Many employers mention age only in relation to retirement.

An overwhelming majority (84%) recognised the need to change processes, behaviours, or both in relation to age, in order to retain older workers in future.²²

5.3 National age management policies

European countries have pursued active ageing policies to varying degrees. Important aspects of active ageing approaches can be identified from countries that have comprehensive programmes. These include:

- social dialogue to bring decision-making processes closer to workers themselves.
- a focus on healthy, secure working conditions
- flexibility within companies to enable older workers to continue working
- improving responsiveness of employment services to the needs of older workers
- identifying ways to improve workers' employability via lifelong learning and career development initiatives
- improving attitudes towards older people in general⁶⁷

Education and training are crucial to improving participation of older workers in the labour force and to enhancing their productive capacities.⁶⁷ Another essential component is the improvement of working conditions and long-term health.⁶⁷ Increasing part-time work opportunities is important and yet it does not appear to be a popular option. To varying degrees European countries have adopted different measures to facilitate the reintegration of older workers into employment eg wage and employment subsidies, career counselling, job placement, preferential treatment for older workers accessing jobs and training for out-of-work older people.⁶⁷ There are few employment-friendly tax-benefit system measures to entice older workers to remain in or return to employment across European countries. Where they do exist, they include in-work top-up benefits, exemptions from unemployment insurance contributions and increased tax credits or personal allowances.⁶⁷

5.4 Workplace age management

The definition of age management emphasises that age related factors should be considered in daily management, including work arrangements and individual work tasks, so that everyone, regardless of age, feels empowered to reach their own and corporate goals.

The eight targets of age management have been defined as:

- better awareness about ageing
- fair attitudes towards ageing
- age management as a core task and duty of managers and supervisors
- age management included in HR policy
- promotion of workability and productivity
- lifelong learning
- age-friendly work arrangements
- safe and dignified transition to retirement⁵⁶

5.5 Workplace age management good practice

Workplace age management requires employers to institute policies and programmes that accommodate older workers and extend healthy working lives. There are many long-standing examples of good practice; however, no single source provides what could be regarded as a comprehensive, definitive account.²⁰ Implementation is at best patchy and incomplete eg few programmes in European countries capitalise on the knowledge of older employees via the transfer of experience.⁶⁷ A survey of UK employees reported that few employees feel that their organisation is taking actions to actively encourage those nearing retirement to continue working.⁷²

Chapter 4 discussed the importance of undertaking risk assessments which consider individual differences between workers in terms of their work capability; and workplace health promotion to encourage workers to adopt healthy lifestyles. Table 3 provides an overview of broader strategic approaches to retain older workers obtained for a survey of employers in the USA.⁶³ Broadly similar strategies are used within Europe.⁷³

Employees and employers alike agree on the importance of flexible working practices to support age diversity but much more needs to be done in this area to truly achieve it.⁷²

Although most employers offer flexible working to some extent, many associate this with parents of young children or 'white collar' workers. Many aren't aware that part-time and flexible working can help many older workers stay in work up to state pension age and beyond.⁷⁴

Acting against best practice is the reality. Many of those aged 40 to 65 years are actively planning their retirement and are not looking to stay on after 65 if possible.⁷² Neither do they see their organisation doing anything to actively encourage those nearing retirement to continue working. Employees and employers alike agree on the importance of flexible working practices to support age diversity, but much more needs to be done in this area to truly achieve it. Employers need to be creative and courageous and rather than following what others do they need to really examine what would work for their business and people and be prepared to "tear up the rule book".⁷²

Table 3. Active age management strategies⁶³

Strategy	Descriptors
Job flexibility	Adjusting schedules or hours Adapting employee roles or job responsibilities as abilities change Phased retirement
Comprehensive benefits package	Flexible benefits Wellness programmes Retirement, financial, and personal counselling and support to help find child care and elder care
Professional growth and development	Emphasis on a lifelong career with the company, with continuing development opportunities Retirees as mentors as part of the "knowledge transfer" process for newer employees; can continue to work part time while drawing a pension Preparing current employees for future roles
Other workplace accommodations	Job safe practices for keeping employees healthy and injury-free A process for responding to worker requests for work and workplace adjustments Use of specialized equipment to reduce physical occupational demands

Often older employees report to younger managers of the opposite sex and they may be too embarrassed to discuss sensitive and in particular gender-related issues. Awareness training for managers and employees can empower workers to speak openly about their health issues and to request support.⁷⁵ Those who manage or who work as part of small teams need to understand and accommodate the needs of older workers ie improvements in workplace temperature and ventilation for menopausal women or access to cold water.^{75,76,77} Ensuring access to toilets and providing more frequent toilet or 'bio-breaks' benefits both menopausal women and males with prostatic enlargement. Similarly, flexible working arrangements can help older workers of both sexes when their sleep is disturbed by nocturia. Such accommodations are neither costly nor complicated.

The NHS Working Longer Group is a partnership group of nationally-recognised NHS trade unions, NHS employers and Department of Health representatives. It was established to review the implications of the NHS workforce working to a later, raised retirement age. In 2015 it published an organisational readiness checklist designed to help NHS employers assess their organisation's age awareness and to help plan actions. The indicators of good practice in the checklist⁶² might be re-applicable to other organisations who do not have their own tools (see Chapter 7).

5.6 Summary

- Employees in late middle-age are often caught between generations of family members requiring care making it difficult to manage these responsibilities alongside work
- While many employers have yet to address the challenges of an ageing workforce effectively and constructively most recognise the need to change processes and/or behaviours in order to retain older workers
- Important active ageing approaches can be identified from countries that have comprehensive programmes, including:
 - Education and training
 - Improved working conditions and long-term health
 - Increased flexible work opportunities
- Occupational health professionals can help educate employers about effective approaches to active age management

Chapter 6 – Practice-based recommendations

Until recent years occupational health issues for older workers in general have largely been ignored. Due to the increasing population of older people in the UK, and increasing employment rates of older workers over the last 10-15 years, there are now more people aged 50 and over in employment than ever before, and the numbers are still increasing – both above and below state pension age.⁷⁸ Not surprisingly such factors generate considerable interest in practice-based recommendations.

Recommendations

Occupational physicians and others who care for patients who work should:

- Be aware that more people are staying in work until later years, with implications for the health and safety responsibilities of employers and their occupational health services
- Help employers review relevant policies, practices and activities to provide a safe, healthy, age-sensitive and discrimination-free working environment
- Provide training for managers and employees on occupational health and wellbeing issues specific to the older worker
- Help managers and workers address prevailing myths and prejudices relating to older workers:
 - There are wide individual differences in functional abilities at any given age and the impact of ageing is minimal among those of working age
 - In most jobs, declining health has no impact on job performance or safety
 - Most people who have long-term conditions or disability continue to work
- Help employers take preventive action, principally through flexible, age-friendly
 policies, the design and organisation of work and access to specialist-led occupational
 health services
- Make employers aware of useful resources (see Chapter 7)
- Contribute to workplace risk assessment and risk management to mitigate the effects of workers being exposed to risks over longer working lives
- Provide workers with suitable occupational health programmes including:
 - Targeted risk-specific health surveillance
 - Individual assessments to identify suitable workplace accommodations to the physical and psychosocial work environment, and to determine whether there are any relevant safety concerns associated with the role
 - Health promotion programmes specific to different age cohorts to promote health and minimise the impact of age on workability – the biological effects of ageing are moderated by increased physical and intellectual activity and the adoption of healthy lifestyle factors from an early age
- Encourage a culture of openness about health issues at work, including age-related health issues:
 - Employees are more inclined to disclose if they regard managers as supportive
 - Managers can only be sympathetic to needs and make suitable work adjustments if made aware of a problem

Chapter 7 – Resources

Resources for medical professionals

The BMA Occupational Medicine Committee has produced other reports:

Alcohol, drugs and the workplace

bma.org.uk/advice/employment/occupational-health/alcohol-drugs-and-the-workplace

Cognitive enhancing drugs and the workplace

bma.org.uk/advice/employment/occupational-health/cognitive-enhancing-drugs

Employer resources

The following are resources from other organisations aimed at employers and managers.

Age Action Alliance Employer toolkit: guidance for managers of older workers ageactionalliance.org/employer-toolkit

Chartered Institute of Personnel Development

Managing a healthy ageing workforce. A national business imperative. A guide for employers. cipd.co.uk/binaries/managing-a-healthy-ageing-workforce-a-national-business-imperative 2012.pdf

Department for Work and Pensions

Employing older workers. An employer's guide to today's multi-generational workforce gov.uk/government/publications/employing-older-workers-an-employer-s-guide-to-today-s-multi-generational-workforce

European Agency for Safety and Health at Work

Healthy workplaces for all ages manager.eguides.osha.europa.eu/en/list-themes

European Network for Workplace Health Promotion

Promoting healthy work for workers with chronic illness: A guide to good practice enwhp.org/uploads/media/ENWHP_Guide_PH_Work_final.pdf

Health and Safety Executive

Health and safety for older workers hse.gov.uk/vulnerable-workers/older-workers.htm

NHS Working Longer Review

The ageing workforce: checklist to assess organisational readiness nhsemployers.org/~/media/Employers/Documents/Need to know/The ageing workforce -Checklist to assess organisational readiness.pdf

National Institute for Health and Clinical Excellence

Workplace health: management practices nice.org.uk/guidance/ng13

References

- World Health Organisation. World health statistics 2016: monitoring health for the SDGs, sustainable development goals. Geneva. World Health Organisation. 2016.
- Public Health England. Recent Trends in Life Expectancy at Older Ages: Update to 2014. London. Public Health England. 2016.
- 3. European Commission. Demography, active ageing and pensions. Social Europe Guide. Vol 3. Brussels. Directorate-General of Employment, Social Affairs and Inclusion. European Union. 2012.
- 4. Eurostat. Statistics explained. Mortality and life expectancy statistics. Eurostat. Luxembourg. Eurostat. 2016.
- 5. Eurostat. Statistics explained. Fertility statistics. Luxembourg. Eurostat. 2016.
- 6. Office of National Statistics. Ageing of the UK population. Newport: Office of National Statistics. 2015.
- Office of National Statistics. Overview of the UK Population. February 2016. Newport: Office of National Statistics. 2016.
- 8. Office of National Statistics. Statistical Bulletin. National Life Tables, United Kingdom, 2012-2014. Newport: Office of National Statistics. 2015.
- Office of National Statistics. Statistical Bulletin. National population projections 2014-based. Newport: Office of National Statistics. 2015.
- 10. Office for National Statistics. News Release. Average Age of retirement rises as people work longer. Newport. Office for National Statistics. 2012.
- 11. Office of National Statistics. Population estimates for United Kingdom by sex and single year of age Mid-1971 to Mid-2013. Newport: Office of National Statistics. 2014.
- 12. United Nations, Department of Economic and Social Affairs, Population Division (2015). World Population Prospects: The 2015 Revision, Key Findings and Advance Tables. Working Paper No. ESA/P/WP.241.
- 13. Drennan J, Treacy MP, Phenan A, et al. Public perceptions of older people and ageing. A literature review. National Centre for the Protection of Older People. Dublin. 2009.
- 14. Taskila T, Shreeve V, Laghini M & Bevan S. Living long, working well: Supporting older workers with health conditions to remain active at work. Lancaster. The Work Foundation. 2015.
- 15. McNair S, Flynn M, Worman D & Wilmott B. Managing a healthy ageing workforce: a business imperative. London. Chartered Institute of Personnel Development. 2012.
- 16. Mongourdin-Denoix S & Schulze-Marmeling S. Older workers and employment. Dublin. European Foundation for the Improvement of Living and Working Conditions. 2011.
- Van Dalen HP, Henkens K & Schippers J. Productivity of older workers: perceptions of employees and employees. Popul Dev Rev, 2010; 36: 309-30.
- Ng TWH & Feldman DC. Evaluating six common stereotypes about older workers with meta-analytical data. Personnel Psychology, 2012; 65: 821–858.
- 19. Department for Work and Pensions. Employer Attitudes to Fuller Working Lives. Department for Work and Pensions. London. 2015.
- Weyman A, Meadows P, Buckingham A. Extending working life audit of research relating to impacts on NHS employees. London. The NHS Confederation (employers) Company Ltd. NHS Working Longer Group. 2013.
- 21. The Economist. Is 75 the new 65? Rising to the challenge of an ageing workforce. London. The Economist Intelligence Unit. 2014.
- 22. Mercer. Age-friendly employer research. 20206-ME. London. Mercer LLC. 2015.
- 23. European Commission. Special Eurobarometer 378. Active Ageing. Brussels. European Commission. 2012.
- 24. Nauta A. Health and Employability of Older Workers. Dublin. European Foundation for the Improvement of Living and Working Conditions. 205.
- Bal AC, Reiss AE, Rudolph CW, Baltes BB. Examining positive and negative perceptions of older workers: a metaanalysis. J Gerontol B Psychol Sci Soc Sci, 2011; 66: 687-98.
- 26. Department for Work and Pensions. Attitudes of the over 50s to Fuller Working Lives. Department for Work and Pensions. London. 2015.
- 27. Farrow A and Reynolds F. Health and safety issues associated with working beyond age 60: a systematic literature review, Occupational Medicine 2012: 62; 4–11.
- Agrawal Y, B.K. Ward, L.B. Minor. Vestibular dysfunction: prevalence, impact and need for targeted treatment. J Vestib Res Equilib Orientat, 2013; 23: 113–117.
- Colledge NR, Wilson JA, Macintyre CC, MacLennan WJ. The prevalence and characteristics of dizziness in an elderly community. Age Ageing, 1994; 23: 117–120.
- Iwasaki S, Yamasoba T. Dizziness and Imbalance in the Elderly: Age-related decline in the vestibular system. Aging Dis, 2014; 6: 38-47.
- 31. Zetterberg M. Age-related eye disease and gender. Maturitas. 2016; 83: 19-26.
- Crawford JO, Graveling RA, Cowie HA, Dixon K. The health, safety and health promotion needs of older workers. Occup Med (Lond), 2010; 60: 184-192.
- Janssens JP, Pache JC & Nicod LP. Physiological changes in respiratory function associated with ageing. Eur Respir J, 1999; 13: 197-205.
- Kenny GP, Yardley JE, Martineau L, Jay O. Physical work capacity in older adults: implications for the aging worker. Am J Ind Med, 2008; 51: 610-25.
- 35. Yeomans L. An update of the literature on age and employment. RR832. Bootle. Health and Safety Executive. 2011.
- Falck RS, Davis JC, Liu-Ambrose T. What is the association between sedentary behaviour and cognitive function? A systematic review. Br J Sports Med, 2016; 0:1–12.
- Descatha A, Herquelot E, Carton M, Sabbath, Goldberg M, Zins M, et al. Short report: Is physically arduous work associated with limitations after retirement? Findings from the GAZEL cohort. Occup Environ Med, 2016; 73: 183-186.
- 38. Office for National Statistics. General Lifestyle Survey: 2011. Newport. Office for National Statistics. 2013.
- Gifford G. Labour Force Survey analysis of disabled people by region and main health problem. London. Department for Work and Pensions. 2015.
- 40. Barnett K, Mercer SW, Norbury M, Watt G, Wyke S, Guthrie B. Epidemiology of multimorbidity and implications for health care, research, and medical education: a cross-sectional study. Lancet, 2012; 380: 37-43.
- 41. Modelled estimates of prevalence of CVD December. London. Public Health England. Association of Public Health Observatories (APHO). 2011.

- 42. Statistical bulletin: Cancer Registration Statistics, *England*, 2013. (Series MB1), No. 44, 2013 ONS Released 10 July 2015.
- Griffiths A, MacLennan SJ, Hassard J. Menopause and work: an electronic survey of employees' attitudes in the UK. Maturitas. 2013; 76: 155-9.
- 44. Logie J, Clifford GM and Farmer RDT. Incidence, prevalence and management of lower urinary tract symptoms in men in the UK. BJU International, 2005; 95: 557–562.
- 45. Office for National Statistics. Women in the labour market. Newport: Office for National Statistics. 2013.
- Rait G, Walters K, Griffin G, et al. Recent trends in the incidence of recorded depression in primary care. The Br J Psychiatry, 2009; 195: 520-524.
- Beaumont J, Lofts H. Measuring National Wellbeing Health, 2013. Office for National Statistics. Newport. 2013.
 Griffiths A, Knight A, Nor Mohd Mahudin D. Ageing, work-related stress and health Reviewing the evidence.
- London. Age Concern; Help the Aged and TAEN. 2009.
- Kingsbury SR, Gross HJ, Isherwood G, Conaghan PG. Osteoarthritis in Europe: impact on health status, work productivity and use of pharmacotherapies in five European countries. Rheumatology (Oxford), 2014; 53: 937-47.
- 50. Turner JA, Franklin G, Turk DC. Predictors of chronic disability in injured workers: a systematic literature synthesis. Am J Ind Med, 2000; 38: 707-22.
- 51. American Federation of Labor and Congress of Industrial Organizations. Death on the Job: The Toll of Neglect. Washington. AFL-CIO. 2016.
- 52. Okunribido O, Wynn A. Ageing and work-related musculoskeletal disorders. A review of the recent literature. RR79. Norwich, HSE Books. 2010.
- 53. NHS Working Longer Review Group. Preliminary findings and recommendations report for the Health Departments. London. NHS Employers. 2014.
- 54. Van den Berg TIJ, Elders LAM, de Zwart BCH, Burdorf A. The effects of work-related and individual factors on the Work Ability Index: a systematic review. Occup Environ Med, 2009; 66:211-220.
- 55. Beers H, Butler C. Age related changes and safety critical work. RR946. Norwich. HSE Books Health and Safety Executive. 2012.
- 56. Ilmarinen J. Promoting active ageing in the workplace. Bilbao. European Agency for Safety and Health at Work. 2012.
- 57. Nexo MA, Meng A, Borg V. Can psychosocial work conditions protect against age-related cognitive decline? Results from a systematic review. Occup Environ Med, 2016;73:487-496.
- McDermott, H. J., Kazi, A., Munir, F., & Haslam, C. Developing occupational health services for active age management. Occup Med (Lond), 2010; 60: 193-204.
- 59. Nicholson PJ, Mayho G, Sharp C. Cognitive enhancing drugs and the workplace. London. British Medical Association. 2015.
- 60. Summers K, Bajorek Z, Bevan S. Self-management of chronic musculoskeletal disorders and employment. London. The Work Foundation. 2014.
- 61. Pärnänen A. Changed attitudes towards older workers. Dublin: EuroFound. 2006.
- 62. NHS Working Longer Review Group. The ageing workforce: Checklist to assess organisational readiness. London. NHS Employers. 2015.
- 63. Timmons JC, Hall AC, Fesko SL, Migliore A. Retaining the older workforce: social policy considerations for the universally designed workplace. Workplace Journal of Aging & Social Policy, 2011, 23: 119-40.
- 64. Maitland A. Working better. The over 50's, the new work generation. Manchester. Equality & Human Rights Commission. 2012.
- 65. World Health Organization. Active ageing: a policy framework. Geneva. World Health Organization. 2002.
- 66. European Commission. Demography, active ageing & Pensions- Social Europe Guide Volume 3. (WLR01a-07). Luxembourg: Publications Office of the European Union. 2012.
- 67. European Employment Observatory. Employment Policies to Promote Active Ageing. Luxembourg. Publications Office of the European Union. 2012.
- 68. Conen WS, Henkens K, Schippers J. Employers' attitudes and actions towards the extension of working lives in Europe. International Journal of Manpower, 2012; 33: 648-65.
- 69. Henkens K & Schippers J. Active ageing in Europe: the role of organisations. International Journal of Manpower, 2012; 33: 604-611.
- 70. Department for Work and Pensions. Fuller Working Lives a Framework for Action. London: Department for Work and Pensions. 2014.
- Accenture/Confederation of British Industry. The path ahead. CBI/Accenture employment trends survey 2015. CBI. London 2015.
- 72. Chartered Institute of Personnel and Development. Managing an age-diverse workforce: What employers need to know. London. Chartered Institute of Personnel and Development. 2015.
- 73. Whittal M. Company-level policies prove effective in age management. Dublin: EuroFound. 2006.
- 74. Department for Work and Pensions. Employing older workers. An employer's guide to today's multi-generational workforce. London: Department for Work and Pensions. 2013.
- British Occupational Health Foundation. Work and the menopause: a guide for managers. London. BOHRF. 2010.
 Griffiths A, Ceausu I, Depypere H, Lambrinoudaki I, Mueck A, Pérez-López FR, et al. EMAS recommendations for
- conditions in the workplace for menopausal women. Maturitas, 2016; 85: 79-81.
 77. Jack G, Riach K, Bariola E, Pitts M, Schapperb J, Sarrel P. Menopause in the workplace: What employers should be doing. Maturitas, 2016; 85: 88–95.
- 78. Department for Work and Pensions. Fuller Working Lives Background Evidence. Department for Work and Pensions. London. 2014.

British Medical Association

BMA House, Tavistock Square, London WC1H 9JP

bma.org.uk