# AGEING AND RETIREMENT 

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## MAIN FINDINGS

» Population ageing, namely the growing share of older age groups, is one of the defining socio-demographic features of developed societies. Whatever indicators are used, we are witnessing an increasingly dynamic change that will also continue in the coming decades according to population projections. In Hungary the share of people aged 65 years or over in the total population rose from $13 \%$ in 1990 to $18 \%$ in 2014, and according to projections, it will reach $29 \%$ by 2060 .
» In recent decades the internal age structure of older groups has changed considerably. The share of people aged 80 and over has been increasing, together with their total number, while the total population size has been falling. In 1990 there were 200,000 people aged 80 and over years, and the same figure was 400,000 in 2011.
" Due to gender differences in mortality, the proportion of women is higher in the older population. Moreover, the older the age group, the larger the difference is. While $58 \%$ of people aged 65-69 years are women, this share is $74 \%$ among people aged 85 years or over.
»In recent decades not only life expectancy at birth but also life expectancy at the age of 60 has been rising steadily, thus the share of the older age span within the total life span has also been expanding. In 2013 life expectancy at the age of 60 was 17.4 years for men and 21.9 years for women. The gender gap has been narrowing in recent years.
» One of the key milestones of ageing is retirement, the exit from the labour market. The average age at retirement has increased considerably, especially among women, due to the tightening of eligibility criteria and the increase in the pension age over the last 15 years. In 2013 the average age at retirement was 59.4 years among women and 62.2 among men. In 1996, in the year prior to the 1997 pension reform, these figures were 54.3 and 58.7 years respectively.
» In terms of the level of pension payments, the Hungarian system can be considered one of the most generous ones in Europe. The median earner - located in the middle of the income ranking - will receive $94 \%$ of their previous earnings as pension upon retirement.
» When getting older, the individual's social and family roles also undergo transformation. After leaving the labour market family roles take central stage in their everyday lives, particularly their role and lived experience as grandparents can become very important. However, because the number of births has been steadily decreasing, fewer and fewer people become grandparents and also families have fewer grandchildren. As people become parents at a later age this has a knock-on effect for grandparenthood as well, that also happens later.
» The steady decline in the number of threeor multigenerational households also has important implications for grandparentgrandchildren relationships, as well as intergenerational labour- and time transfers. Fewer older people live together with their children and grandchildren, therefore direct and everyday relationships can be observed only in a smaller group of the population. Nevertheless grandparents who live in another household can also be of great help. In 2008 $42 \%$ of grandparents aged over 55 were involved in looking after their grandchildren.
» Grandparents who are younger, in better health and more highly educated are more likely to be involved in looking after grandchildren.
»In older age both the structure and the rhythm of everyday activities change. The elderly spend much more time at home, spend longer time alone, and more time on household chores than younger groups. Most of their leisure time is spent watching television. Only a minority spend their leisure time socialising or with outdoors activities.
» For most people the main problem in old age is the deterioration of their health. This becomes increasingly more difficult with age, however in terms of its quality and perception social differences are also important. Among people aged over 64 years $43 \%$ of men and $26 \%$ of women with tertiatry education considered their health good, while only 11-12\% of people with primary education did so.

## POPULATION AGEING

The share of older age groups in society has expanded as a result of low fertility and an increase in the average life expectancy in many countries including Hungary in recent decades.

Demographic ageing is a relatively well documented phenomenon at both the European and national levels. In Hungary the share of population aged 65 years or over was 13\% in 1990, by 2001 it reached $15 \%$ and by 2011 17\% (HCSO, 2011). The latest data - from the beginning of 2014 - indicate that the share of the age group increased to 17.5\%. According to population projections by Eurostat this figure is likely to rise even further and will reach 29 per cent in Hungary by 2060 (Eurostat, 2015).

One of the key social consequences of these changes in the age structure is their impact on the sustainability of different societal institutions. Or differently, how age dependency ratios ${ }^{F}$ change; how many people of active age are needed to "support" those in inactive age groups. The decline in the number of active age population also means that the workforce potential is shrinking that has a negative impact on the sustainability of welfare systems.

The old-age dependency ratio ${ }^{F}$ indicates the number of older people (aged 65 years or over) per 100 people of active age (15-64 years). This ratio increased from 20 to 26 in Hungary between 1990 and 2014 and according to Eurostat calculations it will reach 53 by 2060; thus there will be approximately one person aged 65 or over per each two people of active age. (Figure 1)

The ratio of children and older population (aged 65 and over) is expressed as the ageing index ${ }^{\text {F }}$. In Hungary this index is growing more steadily than the old-age dependency ratio. This is the result of extremely low fertility and suggests that the ratio of active-age and older populations is likely to be even less favourable in the future than it is currently.

Figure 1: Old-age dependency ratio in Hungary based on actual and projected values, 1990-2060


Source: HCSO, Demographic Yearbooks 1990-2014; Projections: Eurostat

The ageing index - the number of older people per 100 children - increased from 65 to 122 between 1990 and 2014. (Figure 2)

Figure 2: Ageing index in Hungary, 1990-2014


Source: HCSO, Demographic Yearbooks 1990-2014

Figure 3: Old-age dependency ratio in European countries, 2013


Source: Eurostat, 2013

Demographic ageing affects all European countries and it is usually the result of low fertility and increased life expectancy. However, there are differences in the extent of demographic ageing and the strength of underlying factors. There are variations within - the generally low - fertility rates and the situation in some countries is more favourable than elsewhere. Also, there are large differences in life expectancy within Europe.
Hungary is characterised by a lower old-age dependency ratio in international comparison (Figure 3) and this is primarily due to relatively lower life expectancy. The countries most affected by demographic ageing are those in the South and North, but Germany also has a very high ratio (Figure 3). In Italy, very low fertility is coupled with high life expectancy, while in Germany and Greece alongside the extremely low fertility there is a relatively high - but still lower than the Italian - life expectancy. In the Scandinavian countries the main underlying factor is not low fertility but high life expectancy.

## DEMOGRAPHIC STRUCTURE OF THE ELDERLY POPULATION

In recent decades not only the ratio of people aged 65 or over increase, but there were also changes in the age structure of the elderly population. Both the number and share of the 'oldest old' - those aged 80 years and over - increased. There were 260 thousand people in this age group in 1990 and 400 thousand in 2011. (Figure 4)

Figure 4: Number of people in older age groups, 1990, 2001, 2011


Source:HCSO, Population Census 2011. Part 4: Demographic Data, 2013.

Due to gender differences in mortality, women are over-represented in older age groups. The older the group, the higher the ratio of women is (Table 1).

Table 1: Older age groups by sex, 2011
(\%)

| Age group | Men | Women | Total |
| :---: | :---: | :---: | :---: |
| $65-69$ | 42.4 | 57.6 | 100.0 |
| $70-74$ | 38.4 | 61.6 | 100.0 |
| $75-79$ | 34.9 | 65.1 | 100.0 |
| $80-84$ | 31.4 | 68.6 | 100.0 |
| $85-$ | 26.4 | 73.6 | 100.0 |

Source: HCSO Population Census 2011. Part 4: Demographic Data, 2013.

## LIFE EXPECTANCY OF THE ELDERLY

Ageing is a natural part of life, however not everybody lives to old age, and there are also socially determined differences in the number of life years expected after one has reached old age.

In demographic research the probability of a birth cohort to reach a certain age is calculated by using life tables. Because there are considerable gender differences, life expectancy is considered separately for men and women. We examined the proportion of children born in a given year that are likely to reach their $60^{\text {th }}$ and $65^{\text {th }}$ birthdays (Figure 5). Between 1990 and 2013 this figure was considerably higher among females. Eightyfive per cent of females born in 1990 and 90\% of those born in 2013 can expect to reach 60 years. As for reaching 65 years, $79 \%$ of the 1990 birth cohort and $86 \%$ of the 2013 cohort can expect this.

Men have a much lower life expectancy. It is estimated that 68\% of males born in 1990 is likely to reach their 60th birthday, and only $57 \%$ to live up to 65 years of age. However, thanks to a dynamic improvement in the 20year period to 2013 the share of those likely
to reach 60 years of age increased to just over $80 \%$ and those expected to live up to 65 years to 72\% (Figure 5).

Figure 5: Estimated share of people reaching 60 and 65 years of age by birth cohort, 1990-2013


Source: Own calculation based on population data.
In addition to life expectancy at birth, average life expectancy ${ }^{F}$ at age 60 has also been improving in recent years. Between 1990 and 2013 life expectancy of males at age 60 increased from 14.7 to 17.4 years, for women from 19 to 21.9 years. The gap between the life expectancy of males and females was growing between 1990 and 2010; however this trend changed after 2010 and the gap has been narrowing since then (Table 2).

There are considerable social differences in terms of educational attainment, especially among men. For men aged 60 to 65 years there was a gap of 4-6 years between the life expectancy of people with the lowest and those with the highest educational levels in 2012. While a 60-year-old man with primary education or vocational training can expect to live 14 years on average, the same figure for graduates is 20 years. The gap narrows with
age as a result of social selection mechanisms. At the age of 70 years it is less than two years between people with the lowest and people with the highest education. Men of this age can expect to live 11-12 years more.

Table 2: Life expectancy at age 60, 1990-2014
(year)

| Years | Men | Women | Total | Difference <br> between <br> women <br> and men |
| :---: | :---: | :---: | :---: | :---: |
| 1990 | 14.7 | 19.0 | 17.0 | 4.3 |
| 2000 | 15.3 | 20.0 | 17.9 | 4.7 |
| 2010 | 16.8 | 21.6 | 19.4 | 4.8 |
| 2011 | 16.9 | 21.6 | 19.5 | 4.7 |
| 2012 | 17.1 | 21.7 | 19.6 | 4.6 |
| 2013 | 17.4 | 21.9 | 19.9 | 4.5 |

Source: HCSO, Demographic Yearbooks 1990-2014
Among women, differences according to educational attainment are smaller. The average life expectancy of women aged 60
years with lower secondary education was 21 years as compared to 23 years of graduates in 2012. Among the 70-year-olds the difference nearly disappears, it is less than one year. The average life expectancy at this age is 14-15 years.
For both genders the difference between people with secondary education and graduates is minimal, therefore the break line in terms of educational attainment is between those without and those with at least secondary education.
As it has been mentioned above, life expectancy in Hungary is comparatively very low in Europe. Only Latvia, Bulgaria and Lithuania have a lower life expectancy for 65-year-old' men than Hungary, and only Bulgaria and Romania for 65 -year-old women. (Figure 6)
At the other end of the European spectrum is Sweden, France, Spain, England and Italy for men, and Italy and Finland for women. Sixty-year-olds can expect to live longest in these countries. (Figure 6)

Figure 6: Life expectancy at age of 65 in Europe, 2012


Source: HCSO, Demographic Yearbook 2013

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## CHANGES IN FAMILY ARRANGEMENTS IN DIFFERENT STAGES OF OLD AGE

The family structure of the elderly is discussed in detail by Chapter 9 of this volume. This chapter considers changes within old age and whether there are any gender differences in this.
Although the analysis is based on crosssectional and not longitudinal data, it indicates that there are important differences between the life trajectories of men and women. One of the main explanatory factors is that the life expectancies of men and women are different; women are still likely to live longer than men. Therefore, the number of people living in a partnership is higher while the number of those who live alone is lower among men in each cohort. Considerably fewer men move in with their children's family when they get old, or live in a three- or multi-generation household. Furthermore very old men are less likely than their female counterparts to become institutionalised for the final stage of their life (Figures 7 and 8 ).
In simple terms, it might be concluded that because the typical old age trajectory for men is shorter than for women, men are more likely to spend the final stage of their life with their partner. Older men who survive their partner tend to continue to live alone, multi-generational or institutional living is less common among them.
However, most women continue to live in a one-person household after the loss of their partner. A less common arrangement among them - although more common than among men - is living in a three- or multigenerational household together with the family of their offspring. Women who live to old age are also more likely to move into an institutional setting compared to men.

Figure 7: Forms of family arrangment among elderly men by age cohort, 2011


Source: Census 2011, 10\% sample, own calculation.

Figure 8: Forms of family arrangement among elderly women by age cohort, 2011


Source: Census 2011, 10\% sample, own calculation.
Family arrangements of elderly age groups vary not only by age and gender but there are also important differences by education. For both genders the share of those living with couple only is
higher among people with higher education. Differences according to education increase with ageing.
Also, the share of one-person households is higher among those with higher levels of education, however in this case the gap narrows with ageing.
Other family arrangements - particularly three- or multigenerational families - are more widespread among people with lower education.
Institutionalisation, that is common among the very old, affects mainly people with lower education; in other words the lower someone's education is the more likely it is that they will spend the final years of their life in an institutional setting.

## ECONOMIC ACTIVITY OF THE ELDERLY AND RETIREMENT

Some of the most important changes in older age are the end of labour market participation and retirement. Pension reforms and active labour market policies have brought about major changes in this area across Europe over the past decade. With the increase of the pension age, the restriction of early retirement and changes in disability assessments, the age at retirement has risen, especially among women. Apart from the increase in pension age, there was another measure that affected the average age at retirement in Hungary: new legislation entered into force in 2012 that allowed women with 40 years of service to retire before pension age. Thus, the average age at retirement for women fell in 2012. According to preliminary data the average age at retirement was 62.2 years for men and 59.4 years for women in 2013 (Figure 9).

Retirement patterns in Hungary were characterised by the widespread early retirement of older workers before reaching state pension age for many years. On the one
hand, this was the result of labour market and pension policies aiming to alleviate labour market problems. On the other hand the increase in the state pension age was introduced very gradually from 1997 to avoid greater social tensions that a rapid rise might have created. Therefore, alongside the rising state pension age the affected cohorts were given opportunities by the law to retire early. This changed fundamentally in 2012: from this date it is no longer possible to retire early before pension age - except for women with at least 40 years of service. At the same time various types of early retirement and occupational pension schemes were abolished.

Figure 9: Average age at old age retirement by sex


Source: 2000-2012: ONYF Statisztikai Évkönyvek (Statistical Yearbooks of the Central Administration for National Pension Insurance); 1996-1999: Munkaerőpiaci Tükör (Labour Market Review) 2007; 2013: Munkaerőpiaci Tükör (Labour Market Review) 2013. Note: To calculate the average age at retirement only people claiming old age pension and pension-like allowances were considered.

As a consequence, according to preliminary data, 90\% of men retiring in 2013 have reached the relevant pension age for the cohort (Figure 10).

Figure 10: Age at retirement of men in relation to general


Source: Central Administration for National Pension Insurance (CANPI).
Note: General pension age is the pension age applicable in a given year. Based on the data it is not possible to take into account occupational differences in pension age.

The situation was somewhat different among women, although there were also many similarities between men and women. Perhaps the most important of these is that early retirement was also widespread among women. However, variations over time in retirement age are more marked among women. More precisely, there are large variations in the gap between the retirement age and pension age even from one year to the other. This is due to the fact that the old-age pension age for women has risen from 55 to 65 years and in the transitional period different pension ages applied to different birth cohorts.

On the other hand the timing of women's retirement also differs from men's in that the restriction introduced in 2012 (i.e. the ban on early retirement) affects only some of them because - as it has been mentioned earlier - those with 40 years of service are entitled to retire and claim old-age pension regardless of their age. This explains that still a large percentage of women - 65\% - who were retiring in 2013 started claiming old-age pension before reaching the relevant pension age (Figure 11).

Figure 17: Age at retirement of women in relation to general pension age


Source: Central Administration for National Pension Insurance (CANPI).
Note: General pension age is the pension age applicable in a given year. Based on the data it is not possible to take into account occupational differences in pension age.

One of the characteristics of the Hungarian pension system is the relatively high replacement rate. This represents a major incentive for retirement compared to many European countries where the level of pensions is well below average earnings or individual pre-retirement earnings.
The Hungarian pension system is the second most generous in Europe, after the Dutch, in terms of the relative level of pensions compared to average earnings or the previous earnings of individuals who retire. Considering the median earner, just before his/her retirement, their equivalent pension amounted to $70 \%$ of the average earnings and $94 \%$ of their previous earnings before retirement (Figure 12).

Inequalities in a pension system that has nearly full coverage of older people and provides a generally high level of benefit mainly arise from the labour market history of individuals. This is because initially pensions were defined on the basis of earnings in the years prior to pension age; however later this period was extended to include all years after 1988. The initial

Figure 12: Pension levels in European countries, 2012


Source: OECD, Pensions at a Glance 2013.
pension is calculated on the basis of earnings during the economically active years and the number of years of service. The amount of pension during later stages of retirement is defined by the rate and principles of pension increases.
Entering the old-age pension system does not necessarily mean a direct transition from the world of work. Many people have already been receiving different forms of welfare assistance (e.g. disability-related benefits), and when they reach the relevant pension age or become eligible for early retirement benefits, they move into the pension system. The system is further
complicated by the fact that people who were previously receiving disabilityrelated pensions are no longer considered pensioners and disability pensions are no longer paid from the pension system. As of 2012 most of the early retirement pensions were also reclassified and they can no longer be considered pensions until the individual claimant reaches old-age pension age.
Based on the number of people receiving disability pension over the pension age, the share of pensioners that "arrived" from the disability pension system can be calculated. They are among the poorer groups of pensioners because they had left the labour

## CALCULATION AND DIFFERENTIATION OF PENSIONS IN EUROPEAN PENSION SYSTEMS

Pension systems in European countries differ not only in terms of the pension age and the number of years of service required
for pension entitlement, but also the way they differentiate between earnings levels when calculating the amount of pensions. Nearly all pension systems set the minimum pension, however many countries also set the maximum amount or they use degression above certain earnings levels. Therefore, most pension regimes have a
strong income-equalising effect among the elderly. It should be also noted that pension systems influence inequalities not only by regulating the benefits of new entrants but also by raising existing pensions.
The figure below illustrates the replacement rate - the pension as a percentage of previous earnings - at retirement for people who have earned under or above the median earnings. It clearly shows that European countries differ not only in terms of the level of state pensions but also in terms of their effect on previous income inequalities by setting the pension level of new entrants.
The smaller the gap between initial pensions and corresponding previous earnings are, the less effect the system has on existing income inequalities among new entrants because it retains original earnings profiles to a larger degree. The Hungarian, Italian, Polish, Dutch, Finnish
and Portuguese state pension systems are the least equalising. Out of these the Hungarian and the Dutch pension systems have the highest replacement rates.

The largest equalising redistribution is observed in the Belgian, Czech, Danish, Irish, Norwegian and UK pension systems.

There are also differences in terms of the groups that are "negatively" affected by the redistribution of income inequalities. The Austrian, German and Spanish state pension systems for example set a very different (lower) replacement rate for the highest earners. While, the pension systems of Finland, Luxembourg or Portugal set the replacement rate of the lowest earners much higher than in the other groups.

In conclusion these mechanisms allow European state pension systems to carry out a significant redistribution within retiring cohorts.

Initial pensions as a percentage of previous earnings at different earnings levels


Source: OECD, Pensions at a Glance 2013.
market longer time ago and their earnings used to calculate their pension were also lower. In 2011 - the last year when disability assistance was still part of the pension system - one in five old-age pensioners (384 thousand out of 1,847 thousand people) were receiving disability pension, thus they were part of the disability pension system when they reached pension age. There were a further 338 thousand people who were receiving disability pension before the old-age pension age. Pension in the first group was $85 \%$ of the average old-age pension, while in the second group it was 70\%.

The level of old-age pensions is also influenced by the number of years of service, therefore this also leads to inequalities within the pension system. At the beginning of 2013 the pension of people with less than 25 years of service was just over half of those who had 40 or more years of service. In the period under consideration the number of pensioners with less than 20 years of service was 180 thousand and
a further 141 thousand had 20-25 years of service. The average pension was HUF 63 thousand in the first group and HUF 66 thousand in the second, while people who retired with 40-44 years of service received on average HUF 120 thousand and those with 45-49 years of service HUF 133 thousand.

Table 4: Number of old-age pensioners and average pension by years of service, 2013
(thousand people, thousand HUF)

| Number of years <br> of service | Number <br> (people, <br> thousand) | Average pension <br> (HUF, thousand) |
| :---: | :---: | :---: |
| -19 | 181 | 63 |
| $20-24$ | 141 | 66 |
| $25-29$ | 212 | 75 |
| $30-34$ | 333 | 87 |
| $35-39$ | 582 | 106 |
| $40-44$ | 488 | 120 |
| $45-49$ | 56 | 133 |
| $50-$ | 8 | 222 |

Source: CANPI Statistical Yearbook 2012

Table 3: Number of people claiming pensions or pension-type benefits, 2011-2013

| Name of assistance | Number (people, thousand) |  |  | Average amount (HUF, thousand) |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | 2011 | 2012 | 2013 | 2011 | 2012 | 2013 |
| Assistance over pension age |  |  |  |  |  |  |
| Old-age pension | 1,462 | 1,488 | 1,519 | 97 | 102 | 110 |
| Disability pension ${ }^{\text {a }}$ | 384 | 397 | 382 | 85 | 88 | 94 |
| Assistance before pension age |  |  |  |  |  |  |
| Disability pension ${ }^{\text {b }}$ | 338 | - | - | 70 | - | - |
| Early old-age pension ${ }^{\text {c }}$ | 238 | 12 | 9 | 115 | 174 | 189 |
| Old-age pension for women based on 40 years of service | - | 63 | 90 | - | 102 | 110 |

Source: Statistical Yearbook of the Central Administration for National Pension Insurance 2012.
Notes: a) Old-age disability pension was reclassified as old age pension in 2012, however it was recorded separately in 2012 and 2013. b) In 2012 early disability pensions ended and were replaced by non-pension benefits. c) In 2012 most early pensions were reclassified and are no longer considered pensions until the claimant reaches pension age.

## THE ELDERLY AND GRANDPARENTING

The well-being of the elderly is influenced not only by their financial situation or the amount of their pension but also by feeling a useful member of society and more importantly their family. After retirement from the labour market, the energies of the elderly are increasingly used within the family, especially in grandparenting roles.

The development of grandparenting roles and the participation of older age cohorts in child care are influenced by changes in the generation of children, parents and grandparents as well. In terms of children, the availability of day care services is a key factor and whether there are any unmet needs after the contribution of parents and institutions. As far as the parents are concerned the main factors influencing child care arrangements are labour market characteristics such as the availability of part-time work and flexibility. From the perspective of grandparents the availability of free time and their health status are necessary to allow participation in child care.

The relationship between grandparents and grandchildren has been influenced by various societal developments in recent years, although their impact remains largely unexplored. One of the main changes is the decline in the number of grandparents who live with their grandchildren. The primary reasons are not declining birth rates and or number of elderly people who become grandparents but the sharp fall in the number of three- or multigenerational households (see Chapter 9 of this volume). With the decline in multigenerational family arrangements, the bond based on daily personal contact between grand parents and grandchildren, that was common in the past, has disappeared.

Another important change is that the age of parents at childbirth has been rising and therefore people become grandparents also
at an older age than in the past. Although life expectancy has been steadily rising, it is unclear whether the health status and physical condition of grandparents permit the same level of involvement with the grandchildren as in previous generations.

The third important change is that age at retirement has been steadily rising since the late 1990s, particularly for women. Thus, the elderly remain active in the labour market longer than in the past. In the late 1990s a woman typically retired at the age of 55 years, whereas now the majority retire after the age of 60 . Therefore the period when older people can provide substantial help with child care has moved to a later stage.

From the perspective of grandchildren the main change is the sharp fall in the availability of nursery and kindergarten places in the last two decades. As a result many families have to arrange their own day care until the children are 3-4 years old.

There is a paucity of empirical research looking at the relationship of grandparents and grandchildren, thus it is not possible to make comparisons over time. However, the 2008 Wave of the Turning Points of Life Course demographic panel survey provides suitable data to examine the participation of grandparents in child care in terms of demographic and social characteristics.
The participation of older generations in child care is obviously dependent on how many of them become grandparents and at what stage of the life trajectory this happens. In $200878 \%$ of the population aged 55 and over had grandchildren. As age rises, not only the proportion of those who are grandparents increases but also the number of grandchildren. However, the overall picture is influenced by a selection mechanism related to mortality: the older an age cohort is the fewer people with low education - who tend to have had more grandchildren - there are in it. Therefore, in the oldest age cohort the share of those who have not become grandparents rises again (Figure 13).

Figure 13: Number of grandchildren by age group, 2008


Source: HDRI GGS Turning Points of Life Course Wave 3, 2008; author's calculation.

In 2008 42\% of grandparents aged 55 years or over participated in the care of children: $43 \%$ of women and $41 \%$ of men, thus a similar proportion of grandmothers and grandfathers took part in child care. The activity of grandparents steadily declines with ageing. While $56 \%$ of 55-59-year-olds took part in the care of their grandchildren or looked after them, this was one in three among 70-74-year-olds and only $14 \%$ among people aged 80-84 years (Table 5).

Looking after grandchildren is also related to health status and results show marked differences according to the level of education of grandparents. In terms of labour market participation, bivariate analysis indicated an opposite relationship to the originally expected: people who are in employment are more likely to be involved in the care of their grandchildren than the inactive. In the multivariate analysis this effect is rather modest suggesting that age, health status and educational attainment are more important determinants than labour market participation itself (Table 5). It is simply the case that those who still work are younger and healthier than those who are inactive and therefore have more energy for grandparenting.

Table 5: Older generations taking part in child care, 2008
(\%)

$\left.$| People aged 55 and over with grandchildren |  |
| :--- | :---: |
| Demographic and social indicators |  | | Participation |
| :---: |
| rate | \right\rvert\,

Source:HDRI GGS Turning Points of Life Course Wave 3, 2008; author's calculation.
Note: Only care for children who live in a separate household were taken into account.

## DAILY LIFE OF THE ELDERLY, TIME USE

The daily life of the elderly, the structure of their activities are illustrated by time-use research that records not only the time spent in different activities but also who the participants spend time with and how much time they spend with them.

Time-use surveys record all activities of participants on a selected day (or days) for 24 hours. In addition to physiological activities (sleeping, eating, personal care)
it provides a detailed picture of any paid or other productive activities (paid and unpaid work, including any housework in their own household etc.) and leisure activities.

One of the most important characteristics of old age is the end of labour market participation; work activities of the elderly are concentrated around household activities. At the same time health problems become more frequent and they need more rest. These are clearly reflected in the daily activity structure of old people.

Older cohorts perform considerably more physiological activities than younger people as they need more bodily rest to regenerate. Particularly, time spent on sleeping and 'passive resting' are steadily increasing with age (Table 6).

Socially determined activities - that include mainly different types of paid and unpaid
work - become much less important within the daily activities as people get older. The only exception is work around the household that has a similar share in the daily activities of different cohorts (Table 6).

The third main group is leisure activities that cover socialising with others, culture and sports participation including watching television, which was the main leisure activity for the elderly (Table 6).

Another aspect of everyday life is the analysis of who participants spend their time with. This question is especially important for the older population because with the end of workplace relationships their personal network shrinks and therefore relationships with family, neighbours and friends have an impact on their well-being. Family is especially important because older people can have an active part

Table 6: Time spent on different activities, 2009-2010

| Activities |  |  |  |  | (minut | ical |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Age groups |  |  |  |  |  |
|  | 40-49 | 50-59 | 60-64 | 65-69 | 70-74 | 75+ |
| Total physiological activities | 682 | 714 | 750 | 771 | 800 | 839 |
| Out of this |  |  |  |  |  |  |
| sleeping | 484 | 497 | 519 | 533 | 554 | 576 |
| Passive resting | 22 | 36 | 48 | 51 | 63 | 79 |
| eating | 98 | 104 | 107 | 106 | 104 | 104 |
| Personal care | 76 | 73 | 73 | 73 | 72 | 74 |
| Total socially determined activities | 535 | 461 | 362 | 336 | 312 | 253 |
| Out of this: |  |  |  |  |  |  |
| Paid work | 244 | 165 | 46 | 19 | 9 | 2 |
| Unpaid work | 28 | 36 | 50 | 50 | 41 | 33 |
| Housework | 184 | 196 | 216 | 216 | 219 | 189 |
| Travel | 75 | 62 | 49 | 49 | 43 | 29 |
| Leisure activities | 223 | 265 | 328 | 333 | 327 | 348 |
| Out of this: |  |  |  |  |  |  |
| socialising | 41 | 42 | 48 | 49 | 51 | 47 |
| entertainment | 157 | 192 | 238 | 240 | 239 | 264 |
| Out of this: |  |  |  |  |  |  |
| Watching television | 131 | 159 | 194 | 191 | 191 | 216 |
| Reading books | 6 | 8 | 11 | 14 | 15 | 7 |
| Reading newspapers/magazines | 10 | 15 | 22 | 25 | 24 | 30 |
| Walking, sports | 12 | 12 | 14 | 15 | 12 | 14 |

Source: HCSO Time-use survey 2009-2010; author's calculation.
Note: The analysis of time diary data and classification of activities use the method of the Hungarian Central Statistical Office.
and it can also provide a safety net when their physical or mental health deteriorates.

Time diary data show that the elderly spend a long time alone. On average, people aged 65-69 years spend more than 10
hours, and people aged 75 years or over more than 11 hours alone. For people under 75 this represents 70\% of total waking time, and for those over 75 it is nearly 80\% (Table 7)

Table 7: Time spent in other people's company, 2009-2010
(minutes, typical day)

| Age groups |  |  |  |  |  |  |
| :--- | ---: | ---: | ---: | ---: | ---: | ---: |
| People they spend time with | $40-49$ | $50-59$ | $60-64$ | $65-69$ | $70-74$ | $75+$ |
| Alone | 420 | 503 | 590 | 623 | 636 | 670 |
| Partner | 83 | 111 | 144 | 137 | 127 | 91 |
| Partner and child | 45 | 20 | 13 | 7 | 4 | 2 |
| Child | 53 | 25 | 18 | 16 | 15 | 30 |
| Parent | 14 | 14 | 7 | 5 | 1 | 1 |
| Grandchildren | 3 | 23 | 38 | 33 | 27 | 17 |
| Sibling | 2 | 3 | 3 | 5 | 5 | 1 |
| Sibling and parent | 1 | 0 | 0 | 0 | 0 | 0 |
| Other relative | 2 | 4 | 5 | 6 | 4 | 3 |
| Not related | 46 | 49 | 46 | 47 | 54 | 44 |

Source: HCSO Time-use survey 2009-2010, author's calculation
Note: Only those activities were included in the analysis that can potentially be performed with others (e.g. sleeping was excluded etc.), and paid work was also excluded because this question is not relevant in that context.

## THE DAILY RHYTHM OF THE ELDERLY

Not only the daily structure of time use but also the daily rhythm of activities changes as well in the older generations. Evidently one of the main factors behind this is exit from the labour market that provided a structure to daily activities in earlier stages of their lives.
There are no major differences between the daily rhythm of men and women in older age. However women are more likely to do some activities than men and vice versa, so the structure of activities throughout the day is slightly different.
The elderly have more freedom to decide when they get up in the morning because they do not need to go to work; nevertheless the results show that both men and women get up relatively early. One
third of 65-74-year-olds are already awake by 6 am, and by 7 am $70 \%$ of women and $75 \%$ of men have already woken up. After personal care and breakfast most men and women start doing housework. However, considerably more women do housework than men and for many this activity lasts until lunch. Meanwhile some people go shopping. Shopping is a common activity for both men and women. Men are more likely to engage in leisure activities in the morning as well, especially watching television or reading, however socialising in the morning is also more common than among women.
The elderly tend to have their lunch relatively early at around 12 am and 1 pm . After lunch many of them take a nap, especially men. At 1pm and 2pm one in three men are asleep or resting. For men the afternoon is a lot more about free time,
while women take longer to transition from housework to leisure activities. Television has an increasing part after lunch especially among men - and this is how a sizeable group of the population spend their time from early afternoon. By 5 and 6 pm nearly a quarter of them are already watching television, at 7pm 42\% of men
and $36 \%$ of women, and at 8pm nearly two thirds.
The elderly not only wake up early but also go to bed early. At 9pm nearly one quarter of men and one in five women are already asleep. At $10 \mathrm{pm} 60 \%$ of men and $65 \%$ of women are sleeping and by 11pm only one in 10 are still awake.

The activity structure of men aged 65-74 years during 24 hours of the day


The activity structure of women aged 65-74 years during 24 hours of the day


## the health status of The ELDERLY

Ageing often goes together with the deterioration of the health status, although there can be important differences both in the extent and speed of the process. Previous research has shown that men tend to have better self-reported health than women. This is despite the fact that they have more unfavourable mortality indicators than women. Better self-reported health is not related to the age structure of men and women over

65 years because it is observed in all cohorts. Overall, 35\% of women aged 65 years or over considered their health bad or very bed, while $31 \%$ of men said the same. On the other hand only $14 \%$ of women and $23 \%$ of men reported their health as good or very good (Table 8).
There were large differences according to education as well: both women and men with higher levels of education were more likely to report good or very good health. This is especially salient among graduates as 43\% of men and $26 \%$ of women said their health was good or very good (Table 8).

Table 8: Self-reported health of the elderly

| Demographic and social characteristics | Self-reported health |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Very good | Good | Acceptable | Bad | Very bad | Total |
|  | Men |  |  |  |  |  |
| Total | 3,7 | 18,9 | 46,8 | 22,9 | 7,6 | 100,0 |
| Age group |  |  |  |  |  |  |
| 65-69 | 5,6 | 23,6 | 51,7 | 14,0 | 5,2 | 100,0 |
| 70-74 | 4,1 | 13,6 | 42,5 | 29,3 | 10,4 | 100,0 |
| 75+ | 1,4 | 17,6 | 44,6 | 28,1 | 8,4 | 100,0 |
| Education |  |  |  |  |  |  |
| At most 8 years of primary school | 1,7 | 10,2 | 47,1 | 29,6 | 11,4 | 100,0 |
| Vocational school | 4,9 | 18,3 | 46,8 | 22,5 | 7,4 | 100,0 |
| Secondary education | 1,9 | 18,9 | 51,9 | 22,8 | 4,5 | 100,0 |
| Tertiatry education | 7,5 | 35,9 | 40,4 | 11,6 | 4,7 | 100,0 |
|  | Women |  |  |  |  |  |
| Total | 1,4 | 12,7 | 50,7 | 26,2 | 9,0 | 100,0 |
| Age group |  |  |  |  |  |  |
| 65-69 | 2,4 | 13,7 | 53,1 | 24,4 | 6,4 | 100,0 |
| 70-74 | 0,8 | 14,2 | 52,7 | 24,6 | 7,8 | 100,0 |
| 75+ | 0,9 | 10,6 | 46,9 | 29,3 | 12,3 | 100,0 |
| Education |  |  |  |  |  |  |
| At most 8 years of primary school | 1,2 | 10,2 | 45,8 | 30,6 | 12,2 | 100,0 |
| Vocational school | 0,0 | 16,9 | 42,8 | 28,2 | 12,1 | 100,0 |
| Secondary education | 0,9 | 11,2 | 62,4 | 22,7 | 2,7 | 100,0 |
| Tertiatry education | 4,7 | 21,1 | 57,6 | 12,5 | 4,1 | 100,0 |

Source: HCSO Time-use survey 2009-2010, author's calculation
Note: The following question was asked: How is your health? (in Hungarian: Megítélése szerint milyen az egészségi állapota?)

## GLOSSARY

Dependency ratios: chil dependency ratio: The number of children aged 0-14 years per the number of people aged 15-64 years.

O/d-age dependency ratio: The number of people aged over 65 years per the number of people aged 15-64 years.

Ageing index: The number of people aged over 65 years per the number of children aged under 15 years.

Average life expectancy: indicates the average number of years a person can expect at different ages to live taking into account the mortality conditions of a given calendar year.

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[^0]:    ${ }^{1}$ Life expectancy at age 65 is used for international comparison.

