



# Highlights on health in Hungary 2005

*Highlights on health* give an overview of a country's health status, describing recent data on mortality, morbidity and exposure to key risk factors along with trends over time. The reports link country findings to public health policy considerations developed by the WHO Regional Office for Europe and by other relevant agencies. *Highlights on health* are developed in collaboration with Member States and do not constitute a formal statistical publication.

Each report also compares a country, when possible, to a reference group. This report uses the 25 countries with low child mortality and low or high adult mortality, designated Eur-B+C by WHO, as the reference group. Eur-B+C comprises Albania, Armenia, Azerbaijan, Belarus, Bosnia and Herzegovina, Bulgaria, Estonia, Georgia, Hungary, Kazakhstan, Kyrgyzstan, Latvia, Lithuania, Poland, Republic of Moldova, Romania, Russian Federation, Serbia and Montenegro, Slovakia, Tajikistan, Tajikistan, Turkey, Turkmenistan, Ukraine and Uzbekistan.

To make the comparisons as valid as possible, data, as a rule, are taken from one source to ensure that they have been harmonized in a reasonably consistent way. Unless otherwise noted, the source of data in the reports is the European health for all database of the WHO Regional Office for Europe. Other data and information are referenced accordingly.

## Keywords

HEALTH STATUS  
BURDEN OF DISEASE  
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## Summary: findings and policy considerations

### Life expectancy

WHO estimates that a person born in Hungary in 2002 can expect to live 72.6 years on average: 76.8 years for women (more than five years below the Eur-A average) and 68.4 years for men (7.5 years below the Eur-A average). Compared to the Eur-B+C average LE, the Hungarian estimate is almost four years longer overall: 4.1 years for males and 3.3 years for females. Hungarians spend on average 10.6% of their lives (7.7 years) with illness.

As the length of life increases, older people can respond with lifestyle changes that can increase healthy years of life. Correspondingly, health care systems need to shift towards more geriatric care, the prevention and management of chronic diseases and more formal long-term care. Since people are living longer, measures to improve health and prevent disease need to focus on people of working age.

*Ageing and employment policies* (OECD, 2004)

*What are the main risk factors for disability in old age and how can disability be prevented?* (Health Evidence Network, 2003a)

### Infant mortality

Infant mortality has declined substantially in Hungary. By 2003, the rate was 7 per 1000 live births, well below the Eur-B+C average of 20 per 1000, but above the Eur-A average of 5 per 1000.

Antenatal care is one of the most important services in health care. Nevertheless, it can be expensive, and interventions may be excessive, unneeded and unproven. A simplified model of antenatal care, based on evidence of benefit, is available.

*Managing newborn problems: a guide for doctors, nurses and midwives* (WHO, 2003a)

*What is the efficacy/effectiveness of antenatal care?* (Health Evidence Network, 2003b)

*The WHO reproductive health library, version 6* (WHO, 2003b)

### Main causes of death

In 2003, selected main noncommunicable diseases accounted for about 87% of all deaths in Hungary, external causes for almost 8%, and communicable diseases for 0.4%. In total, 57% of all deaths were caused by diseases of the circulatory system and 25% by cancer. The cancer death rates in Hungary are higher than Eur-A averages in all age groups. Mortality rates across all age groups and for both sexes in Hungary are lower than Eur-B+C averages. Mortality rates among Hungarian females are about 55% higher than Eur-A averages and among males, 69% higher.

The death rates from cardiovascular diseases and external causes are now below the Eur-B+C average, but still significantly higher than the Eur-A average. The cancer death rates are among the highest in the WHO European Region, well above the Eur-B+C and Eur-A averages. The death rates from diseases of the digestive system are also high, following mortality from chronic liver disease and cirrhosis.

The high Hungarian suicide rates have declined substantially in all age groups since the 1970s.

Preventive care, delivered through a country's primary care system, can reduce all-cause mortality and premature mortality, particularly from CVD.

*A strategy to prevent chronic disease in Europe: a focus on public health action: the CINDI vision* (WHO Regional Office for Europe, 2004a)

*Towards a European strategy on noncommunicable diseases* (WHO Regional Office for Europe, 2004b)

*What are the advantages and disadvantages of restructuring a health care system to be more focused on primary health care services?* (Health Evidence Network, 2004)

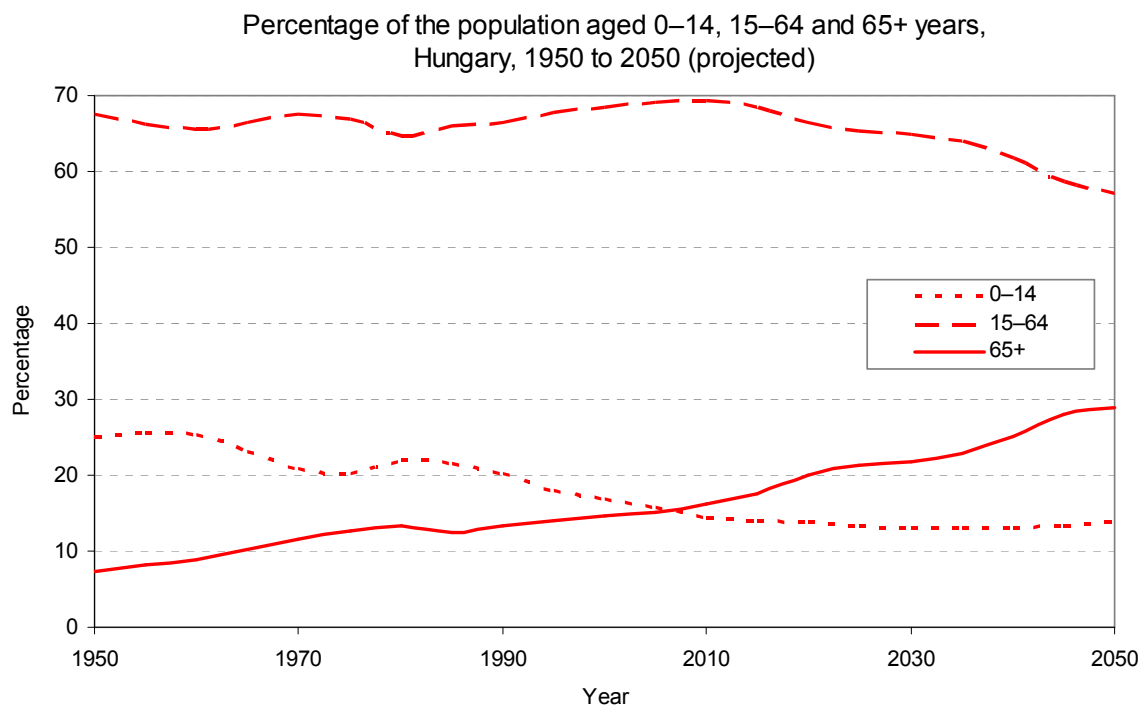
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## Selected demographic and socioeconomic information

### Population profile

In mid 2003, Hungary had approximately 10 million people. Almost 65% of the population lives in urban areas, about the average for Eur-B+C countries.

The proportion of the population 0 to 14 years old was relatively steady during the 1980s, but fell from about 20% of the population in 1990 to 16% in 2003, below the Eur-B+C average. Conversely, the percentage of the population over 65 years old is above the Eur-B+C average (Council of Europe, 2005). By 2030, an estimated 22% of Hungary's population will be 65 or older. (Annex. Age pyramid).



Source: United Nations (2005).

The birth rate in Hungary was in the low end of Eur-B+C countries in 2003. Natural population increase is negative and below the Eur-B+C average, while net migration is positive and average for Eur-B+C.

Selected demographic indicators in Hungary and Eur-B+C  
2003 or latest available year

Indicators	Hungary	Eur-B+C		
	Value	Average	Minimum	Maximum
Population (in 1000s)	10129.6	–	–	–
0–14 years (%)	16.0	–	–	–
15–64 years (%)	68.6	–	–	–
65+ years (%)	15.4	–	–	–
Urban population (%) <sup>a</sup>	64.7	63.7	25.0	73.3
Live births (per 1000)	9.3	12.8	8.6	27.1
Natural population growth (per 1000)	–4.1	0.8	–7.5	23.0
Net migration (per 1000)	1.5	1.8	–6.6	2.1

<sup>a</sup> 2002

Sources: Council of Europe (2005), WHO Regional Office for Europe (2005).

## Socioeconomic indicators

Health outcomes are influenced by various factors that operate at individual, household and community levels. Obvious factors are, for example, diet, health behaviour, access to clean water, sanitation and health services. However, underlying health determinants of a socioeconomic nature also play a role in causing vulnerability to health risks. Here, the key factors are income, education and employment. Though moderately correlated and interdependent, each of these three determinants captures distinctive aspects of the socioeconomic background of a population and they are not interchangeable. Various indicators represent the key socioeconomic determinants of health.

### **Income: absolute poverty, relative poverty and income distribution**

There is an income gradient affecting health: the poor generally suffer worse health and die younger than people with higher incomes. For instance, the latter are better able to afford the goods and services that contribute to health, for example, better food and living conditions.

People are considered to be in absolute poverty if their incomes are not sufficient to purchase very minimal goods and services. The World Bank currently uses an absolute poverty line of US\$ 2.15 and US\$ 4.30 income per capita per day to measure poverty in low- and middle-income countries of the WHO European Region (using 1993 international prices adjusted for purchasing power parity). While there is no certainty that the poverty lines measure the same degree of need across countries, the World Bank uses them as a constant to permit comparison. Many countries in the Region calculate their national poverty lines on the basis of a minimum consumption basket selected and priced according to the specific circumstances of the country.

Relative poverty is an indicator of income level below a given proportion (typically 50%) of the average national income. In high-income countries, there are far more pockets of relative poverty than of absolute poverty.

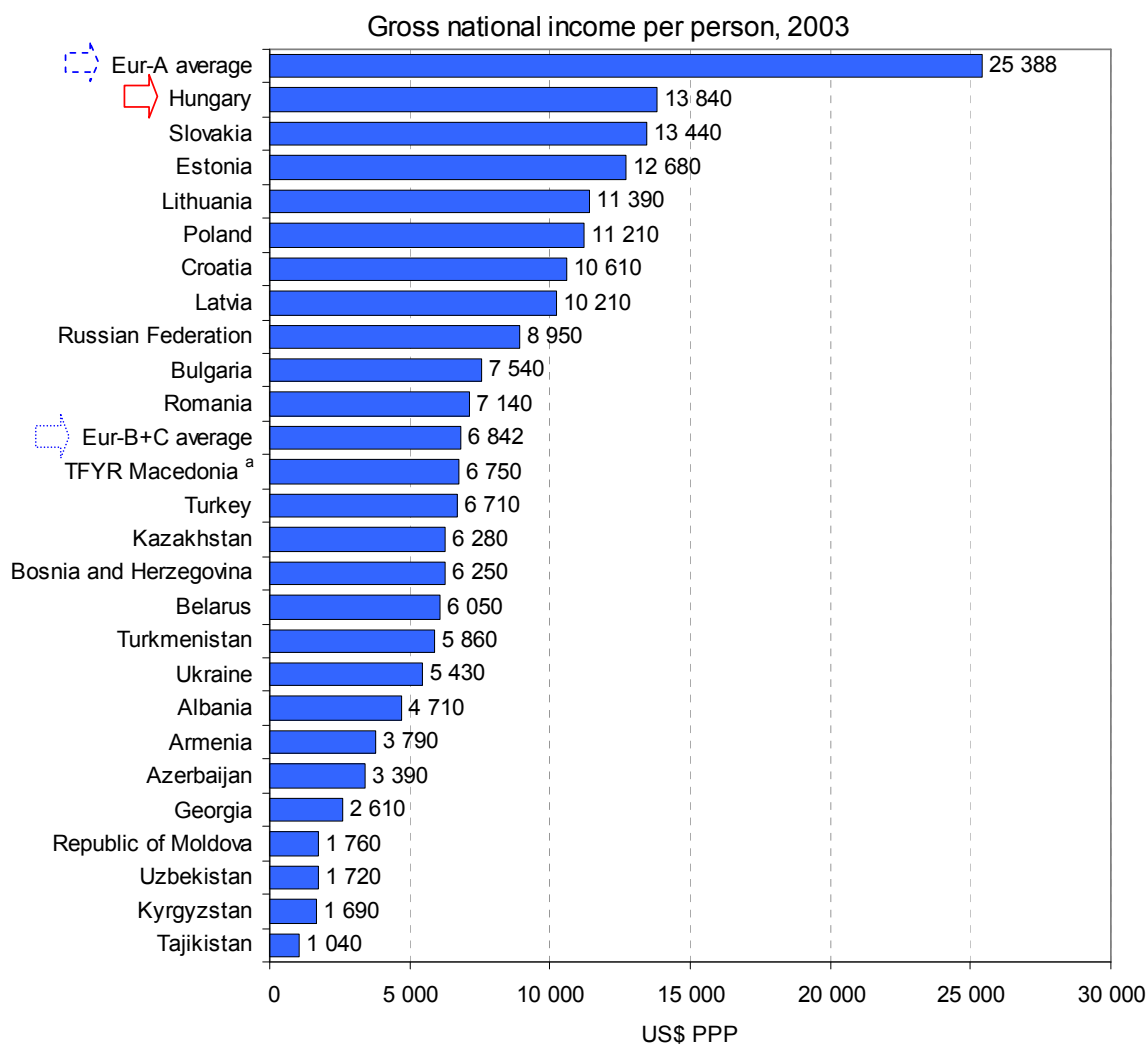
Below is a profile of the key socioeconomic indicators for Hungary along with averages, where relevant, to permit comparison with a reference group of countries.

In 2003, Hungary had the highest per capita gross national income in the Eur-B+C group: US \$13 840, adjusted for purchasing power parity, compared to the \$6842 average for Eur-B+C.

Using the World Bank's recommended benchmarks to measure absolute poverty in Europe, annual household surveys in Hungary found that in 1987, 1.2% of people were living on US \$4.30 per day while in 1989, the proportion had risen to 19.2%. It fell to 12.1% in 1993 then jumped again to 18.6% in 1998. The 2002 survey found that less than 2% of the population was living on US \$2.15 per person per day (World Bank, 2005).

Eurostat reports that in 2002, 10% of the Hungarian population lived in relative poverty, that is, below the risk-of-poverty threshold set at 60% of the national median equivalized disposable income (after social transfers). That same year, across the nine Eur-B+C countries with data, 16% of the

populations on average lived in relative poverty. By contrast, in 2001, across the 17 Eur-A countries with comparable data, an average of 14% of people lived in relative poverty (Eurostat, 2005).



<sup>a</sup> The former Yugoslav Republic of Macedonia

Source: World Bank (2005).

There is a proven association between poverty in childhood and marked and measurable disadvantages in later life, including health status. Child poverty is monitored on the basis of family income. A child is considered relatively poor if the income available to the child (assuming a fair distribution of resources within a family and making allowances for family size and composition) is less than half the median income available to an average child growing up in the same society (UNICEF, 2005).

In 1999, 8.8% of children in Hungary lived in relative poverty, meaning they lived in households with income below 50% of the national median income. From approximately 1991/1992 until 1999, there was a 1.9% increase in child poverty rates. Hungary is one of 17 of 24 OECD countries with an increase in the proportion of children living in poverty in the 1990s. Norway is the only OECD country where child poverty is very low and continues to fall (UNICEF, 2005).

Another measure of relative poverty in terms of income is the Gini index. This presents the extent to which the distribution of income (or, in some cases, consumption expenditure) among individuals or households within an economy deviates from a perfectly equal distribution. A Gini index of 0 represents perfect equality, while an index of 100 implies perfect inequality.



In 1999, the latest year for which data are available, the GINI index for Hungary was 24.4. The GINI indices for 15 Eur-B+C countries for 2000 to 2002 range from 26.1 for Bosnia and Herzegovina (2001) to 45.6 for the Russian Federation (2000) (World Bank, 2005).

### **Education**

Education tends to enhance an individual's job opportunities. In so doing, it can improve income, which in turn affects health positively. Education can also give more access to knowledge about healthy behaviour and increase the tendency to seek treatment when needed. A lower level of education – independent of individual income – is correlated with the inability to cope with stress, with depression and hostility and with adverse effects on health.

School enrolment is an indicator of access to education. The secondary school net enrolment represents the percentage of the total population of official school age (defined nationally) that is enrolled in secondary schools.

Net secondary school enrolment in Hungary in 1999 (the latest year for which data are available) was 86.8%, compared to an 81.2% average for Eur-B+C countries in 2000. The average secondary school net enrolment in Eur-A in 2000 was 88.5% (UNESCO, 2005).

### **Employment**

Being employed tends to be better for health than being unemployed, except in circumstances where employment exposes the individual to physical injury or psychological stress. National unemployment rates and rates for particular sub-populations are monitored to assess the extent to which people have or lack access to opportunities that would enable them to earn an income and feel secure. Vulnerability to health risk is increased by long-term unemployment, that is, continuous periods without work, usually for a year or longer; the socioeconomic status of an individual and of his/her dependents can slide as the period of unemployment increases.

The total unemployment rates in Hungary in 2001 and 2002 were 5.7% and 5.8%, respectively, compared to a Eur-B+C average of 12.9% for 2001, keeping in mind that national rates are based on estimates of people available and seeking employment, and that countries have different definitions of labour force and unemployment (ILO, 2005). From 2000 to 2002, 44.8% of those unemployed had been so for a year or longer (World Bank, 2005).

The proportion of young Hungarians, 15 to 24 years old, without work but available for and seeking employment was 11.2% in 2001 and 12.6% in 2002. The Eur-B+C average youth unemployment rate for 2001 was 25.2% (ILO, 2005).

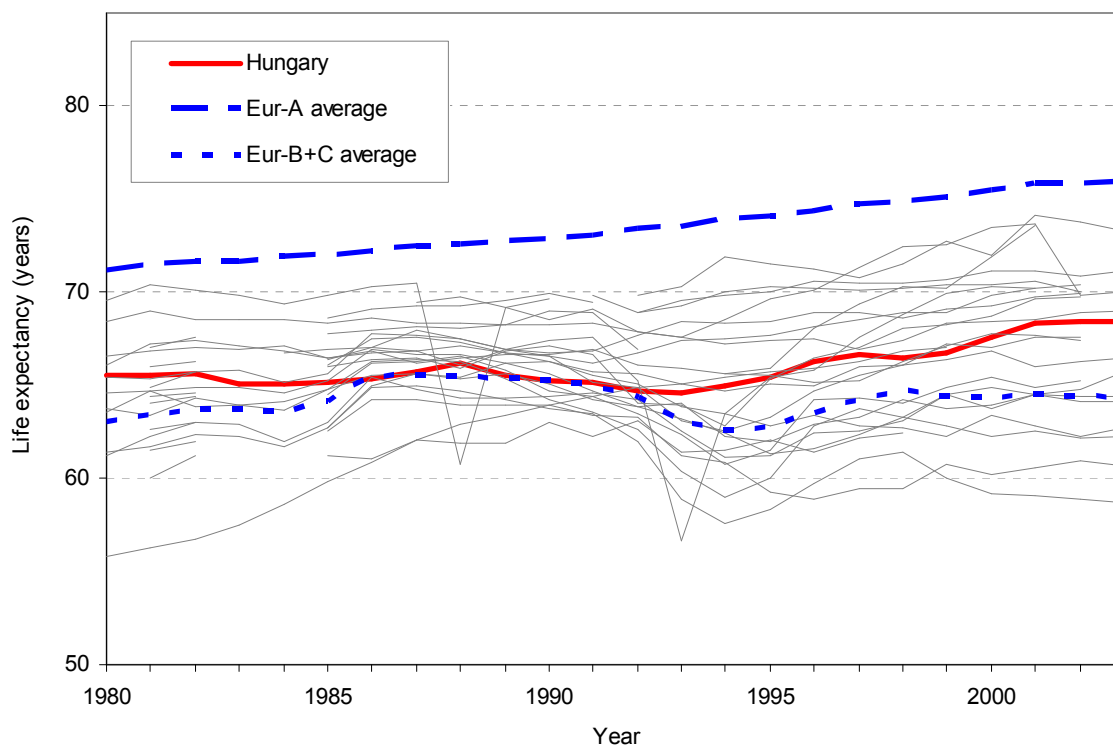
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## Life expectancy (LE) and healthy life expectancy (HALE)

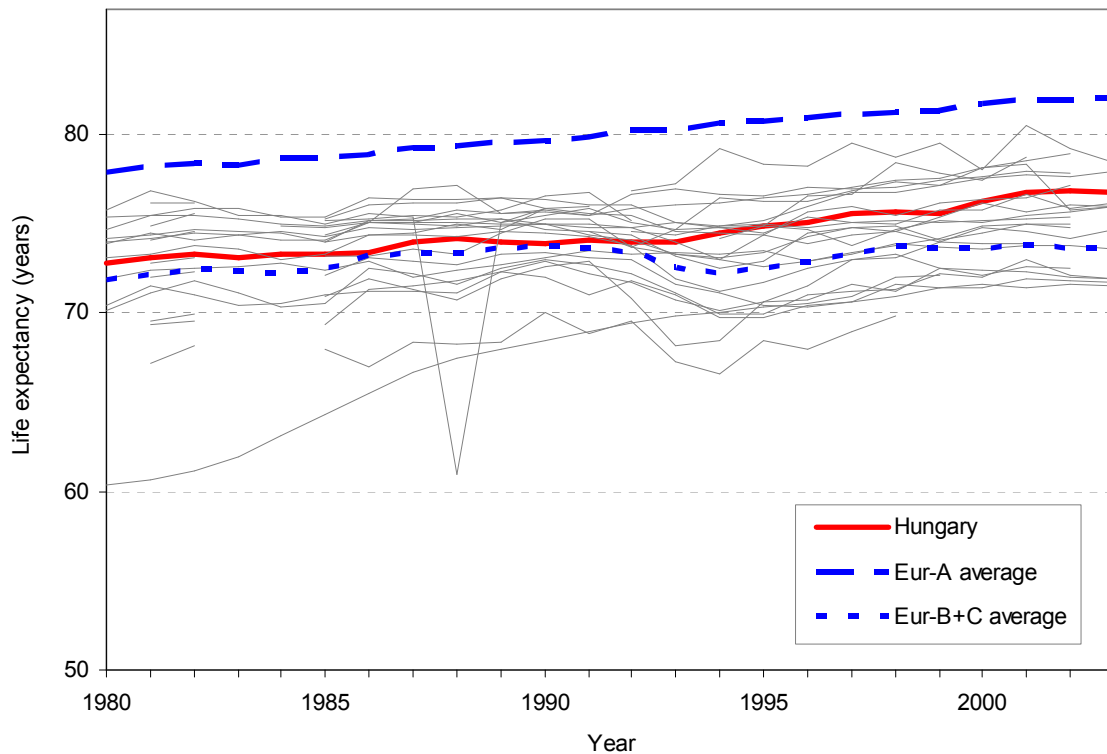
### Life expectancy

According to WHO (2003c) estimates, a person born in Hungary in 2002 can expect to live 72.6 years on average: 76.8 years if female and 68.4 years if male. Life expectancy (LE) in Hungary is 7.5 years lower than the Eur-A average for males, and more than five years lower for females. The Hungarian LE is, however, almost four years longer than the Eur-B+C average. Also in this comparison, the difference is larger for men (4.1 years) than for women (3.3 years).

Life expectancy at birth for males, Hungary, Eur-A and Eur-B+C averages, 1980 to latest available year

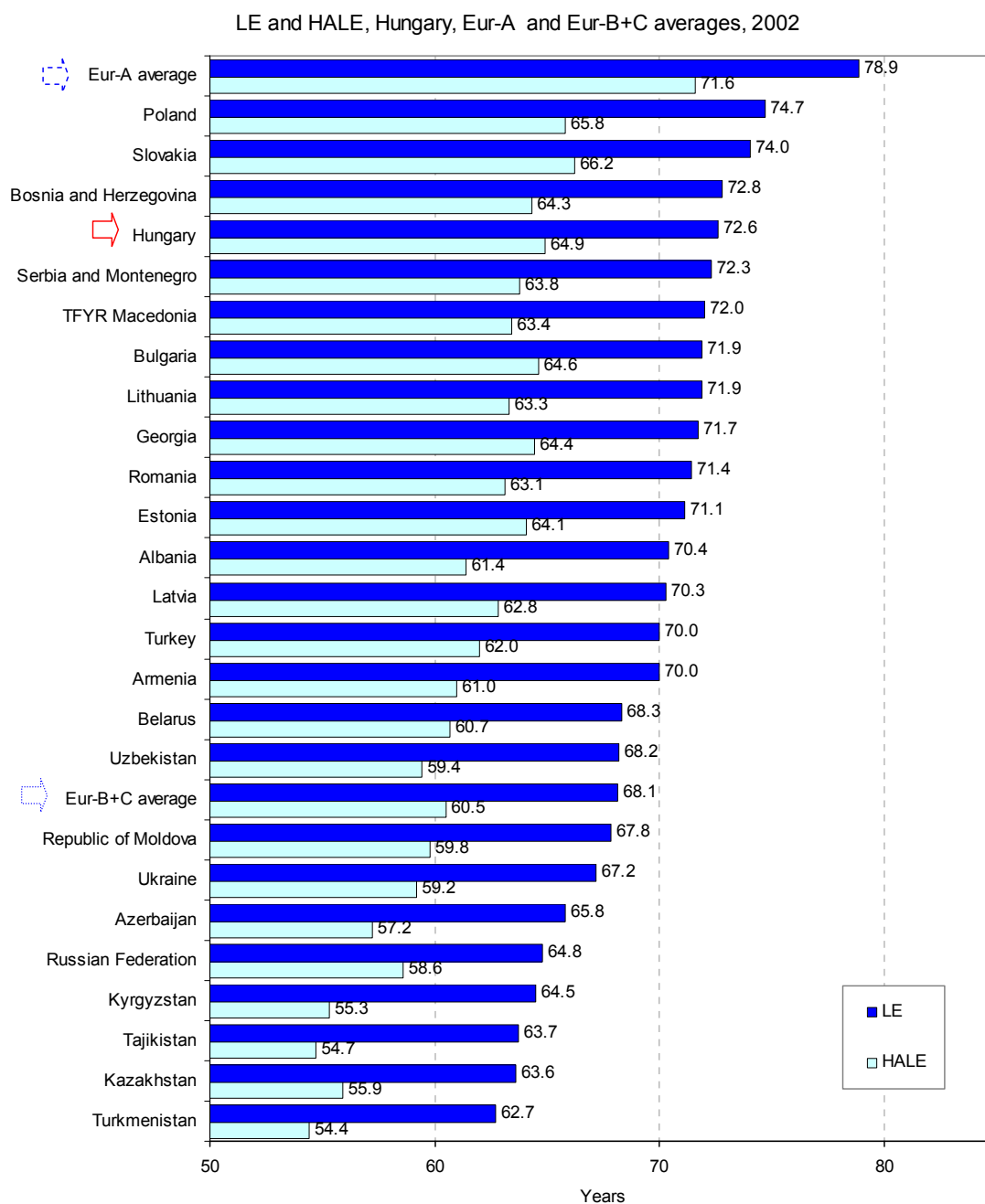


Life expectancy at birth for females, Hungary, Eur-A and Eur-B+C averages, 1980 to latest available year



Hungarian LE stagnated in the 1970s and 1980s, with a slight increase for women and a decrease for men. The trend changed in 1994. Since then, Hungarians have gained about 3 years of LE, with a greater gain for men (3.4 years) than women (2.3 years). These gains are similar to those in other central and eastern European countries, although Hungary has remained around 1.5 years below their average.

In addition to LE, it is increasingly important to know the expected length of life spent in good health. WHO uses a relatively new indicator for this purpose – healthy life expectancy (HALE), subtracting estimated years of life spent with illness and disability from estimated LE. For Hungary, WHO (2003c) estimates that people can expect to be healthy for about 89% of their lives. They lose an average of 7.7 years to illness – the difference between LE and HALE. This loss is similar to the Eur-A average (7.3 years) and the Eur-B+C average (7.6 years).



Since women live longer and since the possibility of deteriorating health increases with age, women lose more healthy years of life (8.6 years) than men (6.9 years). Nevertheless, the longer LE for women in Hungary gives them 6.7 extra years of healthy life. For people 60 years old, females (16.0 years) have almost four more years of healthy life remaining compared to males (12.1 years), according to WHO estimates (2003c).

## Burden of disease

The burden of disease in a population can be viewed as the gap between current health status and an ideal situation in which everyone lives into old age, free of disease and disability. Causing the gap are premature mortality, disability and certain risk factors that contribute to illness. The analysis that follows elaborates on the burden of disease in the population. The disability-adjusted life-year (DALY) is a summary measure that combines the impact of illness, disability and mortality on population health.

## Main conditions

The table below shows the top 10 conditions, in descending order, that account for approximately 90% of the burden of disease among males and females in Hungary. Cardiovascular diseases and neuropsychiatric conditions account for the highest burden of disease among both males and females. Because mortality from neuropsychiatric conditions is minor, disability in daily living comprises the bulk of their disease burden.

Ten leading disability groups as percentages of total DALYs for both sexes in Hungary (2002)

Rank	Males		Females	
	Disability groups	Total DALYs (%)	Disability groups	Total DALYs (%)
1	Cardiovascular diseases	23.6	Cardiovascular diseases	22.6
2	Neuropsychiatric conditions	18.6	Neuropsychiatric conditions	20.5
3	Malignant neoplasms	17.8	Malignant neoplasms	16.2
4	Digestive diseases	10.0	Digestive diseases	7.4
5	Unintentional injuries	6.8	Sense organ diseases	6.5
6	Intentional injuries	5.5	Musculoskeletal diseases	6.3
7	Sense organ diseases	4.4	Respiratory diseases	4.5
8	Musculoskeletal diseases	3.1	Unintentional injuries	4.1
9	Respiratory diseases	2.6	Intentional injuries	1.9
10	Infectious and parasitic diseases	1.2	Diabetes mellitus	1.7

Source: Background data from WHO (2003).

## Main risk factors

The table below shows the top 10 risk factors with their relative contributions, in descending order, to burden of disease in the male and female populations. According to DALYs, tobacco use places the greatest burden of disease on the Hungarian population. The burden is estimated using current levels of smoking impact (such as lung cancer mortality) and the prevalence of oral tobacco use.

Ten leading risk factors as causes of disease burden measured in DALYs in Hungary (2002)

Rank	Males		Females	
	Risk factors	Total DALYs (%)	Risk factors	Total DALYs (%)
1	Tobacco	25.5	Tobacco	15.2
2	Alcohol	22.8	High blood pressure	11.8
3	High blood pressure	12.6	High BMI	9.1
4	High cholesterol	9.5	High cholesterol	8.1
5	High BMI	6.7	Alcohol	6.8
6	Low fruit and vegetable intake	6.2	Low fruit and vegetable intake	5.0
7	Physical inactivity	3.8	Physical inactivity	3.9
8	Lead	1.1	Unsafe sex	2.1
9	Contaminated injections in health care se	1.0	Indoor smoke from solid fuels	1.2
10	Illicit drugs	1.0	Childhood sexual abuse	1.0

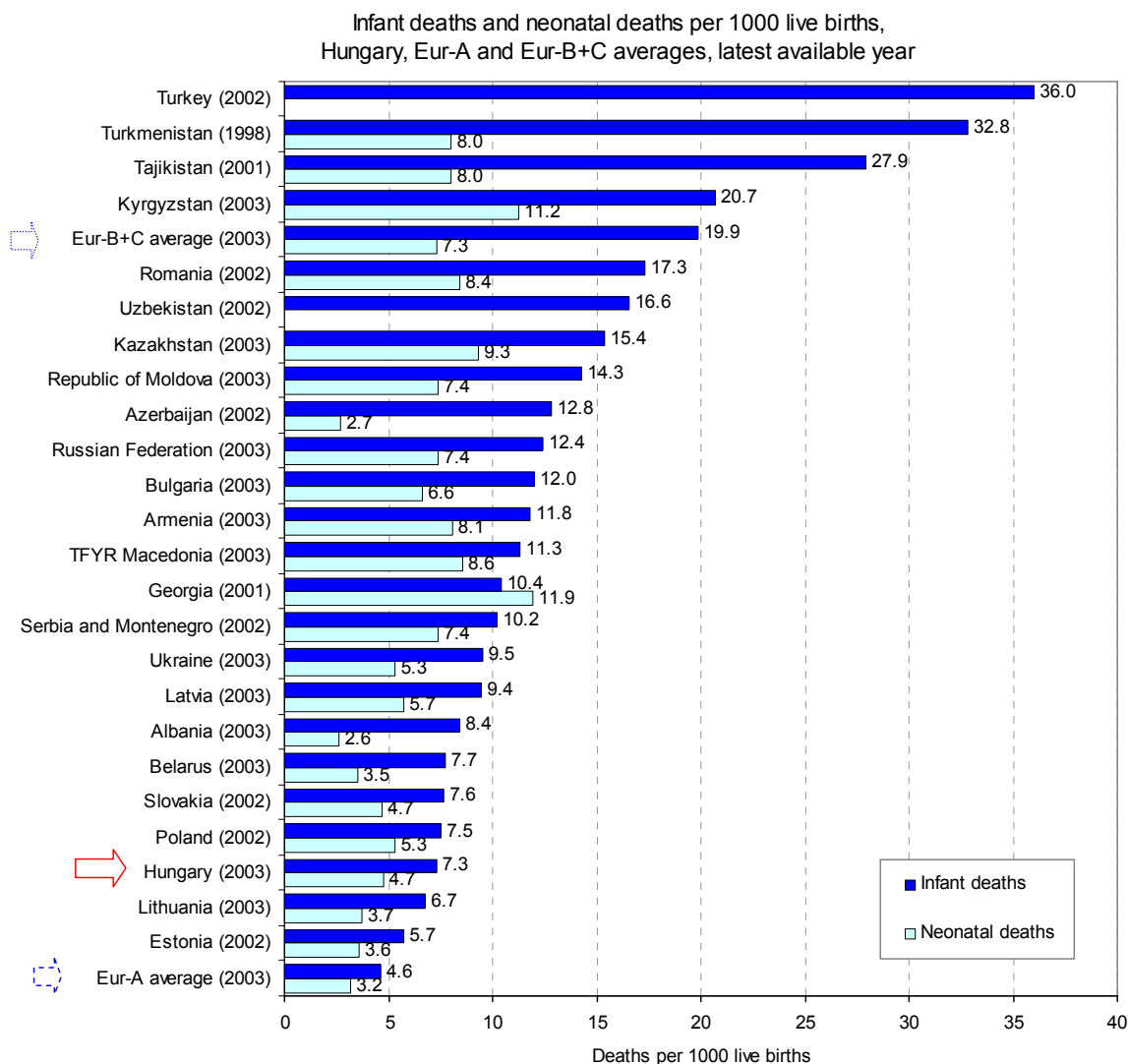
Source: Background data from WHO (2003).

## Mortality

### Infant, neonatal and child mortality

Infant mortality has declined substantially in Hungary. The most recent rate (7 per 1000 live births in 2003) remains well below the Eur-B+C average (20/1000), but still above the Eur-A average (5/1000). A similar decline can be observed in neonatal mortality rates.

National data and WHO estimates for 2003 show that out of every 1000 live births in Hungary, there is a probability that between 8 and 9 children will die before age five. The lowest WHO estimates for the Eur-B+C countries are for Estonia and Slovakia, each at 8 deaths per 1000 live births. Hungary's estimates are among the lowest for the Eur-B+C countries.



## Maternal mortality

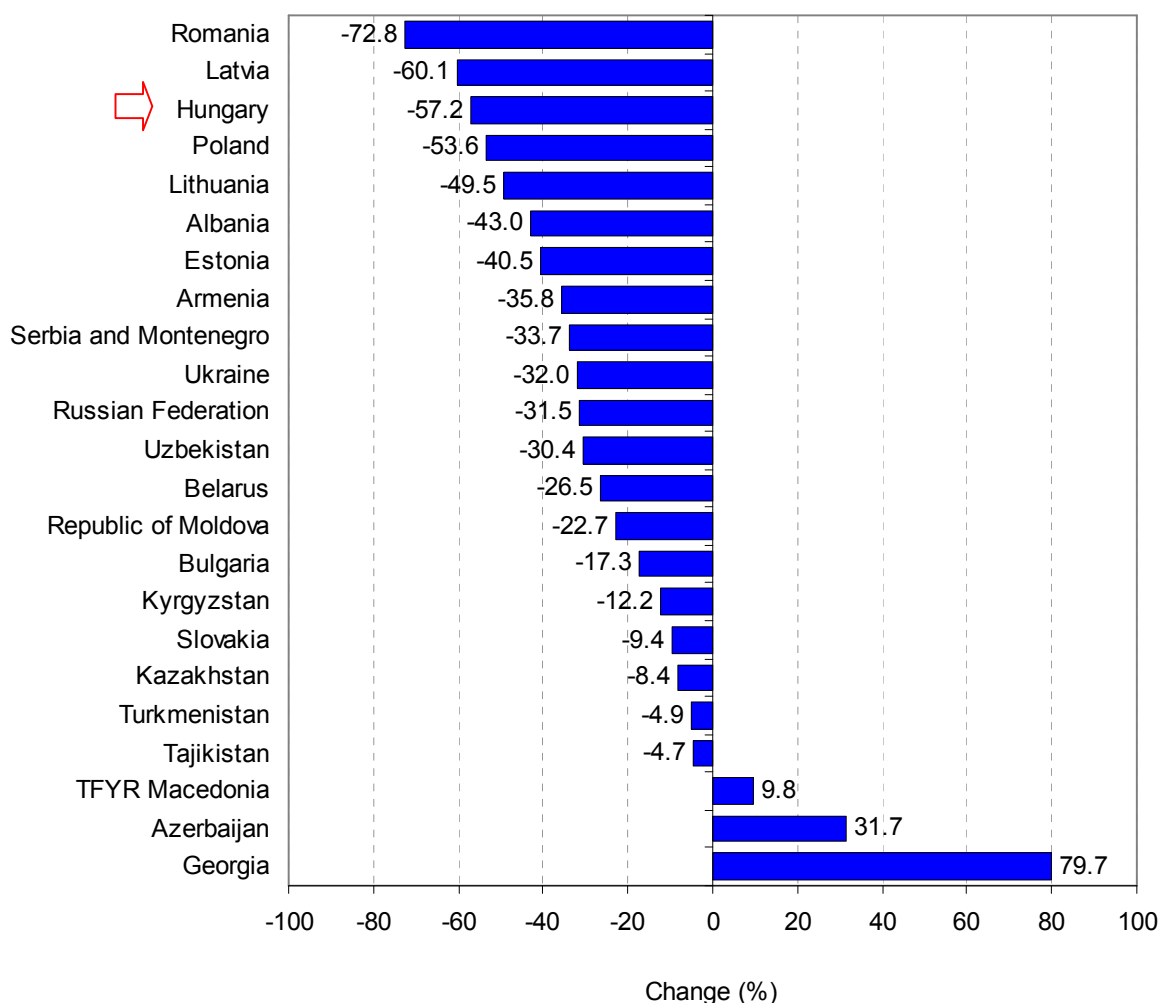
### **Maternal mortality rates (MMR) and the Millennium Development Goal (MDG)**

Despite the difficulties in accurately measuring MMR, nationally reported figures are accepted at face value relative to the MDG to improve maternal health – to reduce the MMR by 75% between 1990 and 2015. In some countries, the 2015 target may be equal to or lower than the average current MMR for high income countries in the European Region (the Eur-A 2001 average of five maternal deaths per 100 000 live births). Countries with 2015 targets lower than the current Eur-A average can be judged as having achieved or being likely to achieve the MDG (World Bank, 2004).

However, in some countries, MMR were higher in 2002 than they had been in 1990. Applying the 75% reduction to the 1990 baseline in these countries creates, in some cases, a 2015 MDG target that requires dramatic reductions in MMR before 2015. In these cases, more important than reaching maternal mortality targets is taking concrete action to provide women with access to adequate care during pregnancy and childbirth, initiatives that have proven to bring down MMR.

The maternal mortality ratio has also declined in Hungary, whose current rate (7 per 100 000 live births in 2001–2003) is significantly lower than the Eur-B+C average (54/100 000), and only slightly above the Eur-A average (5/100 000). It fell fairly consistently between 1990 and 2002, and if it were to reach the MDG target based on its 1990 level, it would have a better rate than the current Eur-A average. From 1999 to 2003, 3 out of 34 maternal deaths were due to induced or spontaneous abortion (including ectopic pregnancies).

Per cent change for maternal mortality (3-year moving averages),  
1990 to 2002 or latest available year

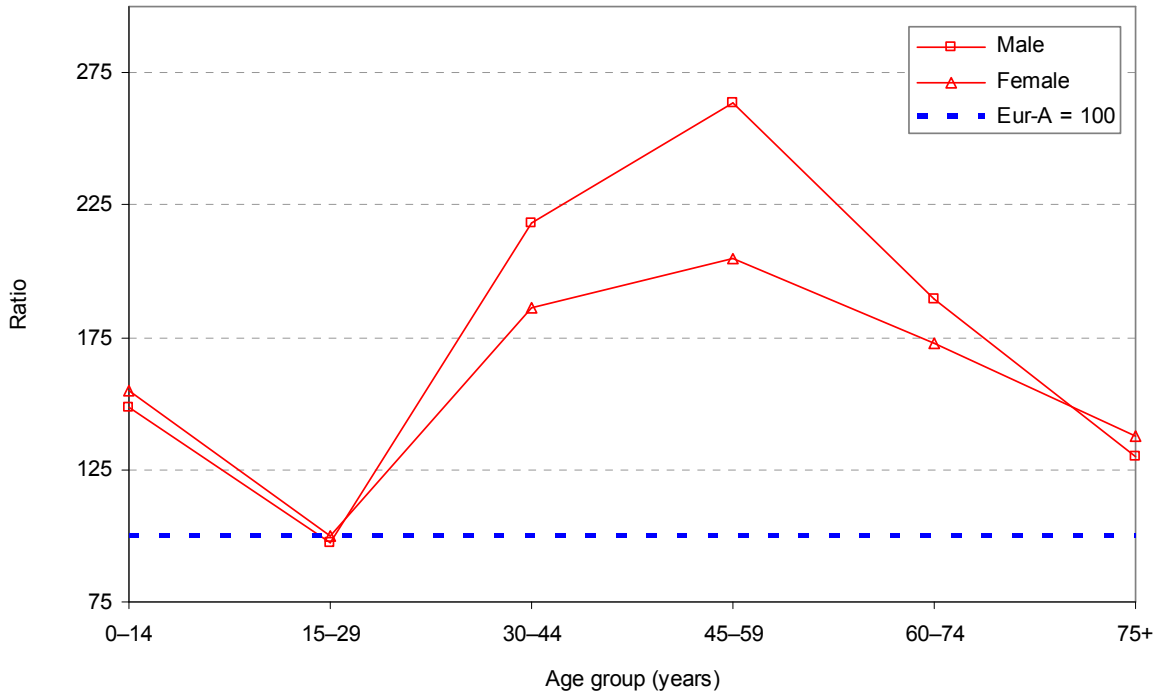


### Excess mortality

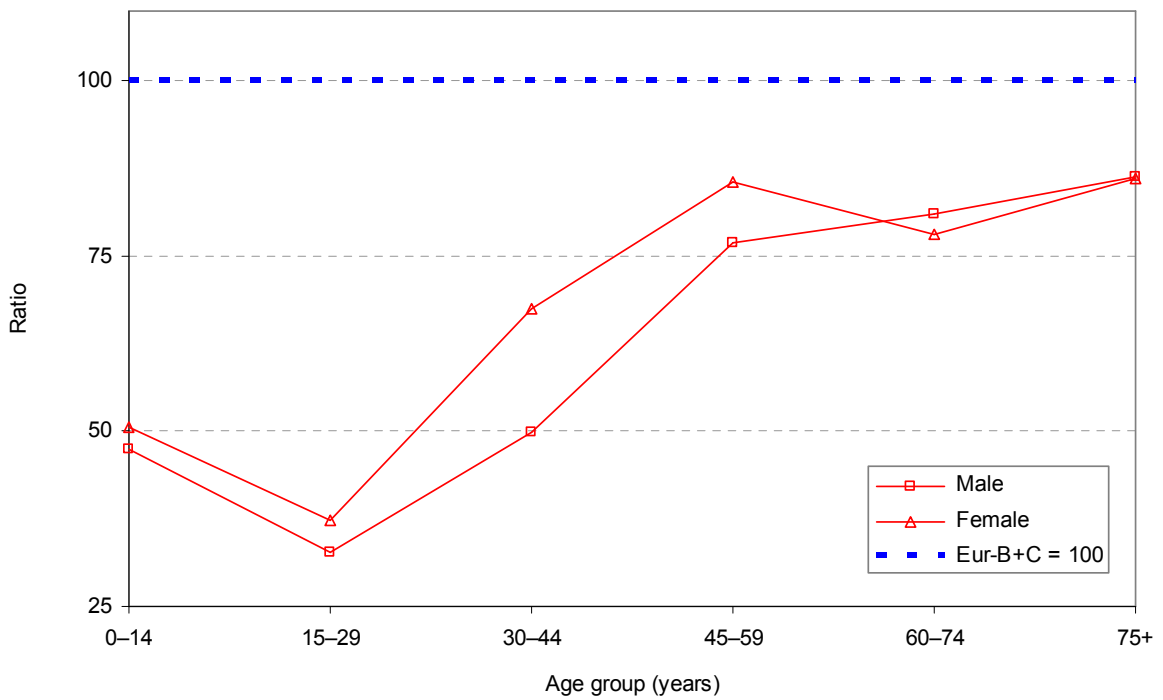
In general, mortality rates for males in Hungary are more than 20% lower than the Eur-B+C average. Lower mortality rates can be found in all age groups and for both sexes. Hungarians under 30 years old have a mortality risk less than half of the Eur-B+C average. The difference is proportionally smaller for people 45 years old and above, whose mortality rates are between 15% and 25% lower than in the Eur-B+C average.

Hungarian women have about 55% higher mortality than the Eur-A average, while men have 69% higher mortality. There is an excess mortality risk in all age groups excluding the 15–29 year-old group. The excess risk is at its highest in the 45–59 year-old range, where female mortality is more than double the Eur-A average and male mortality 2.5 times greater.

Total mortality by sex and age group in Hungary in comparison with Eur-A (Eur-A = 100), 2003



Total mortality by sex and age group in Hungary in comparison with Eur-B+C (Eur-B+C = 100), 2003





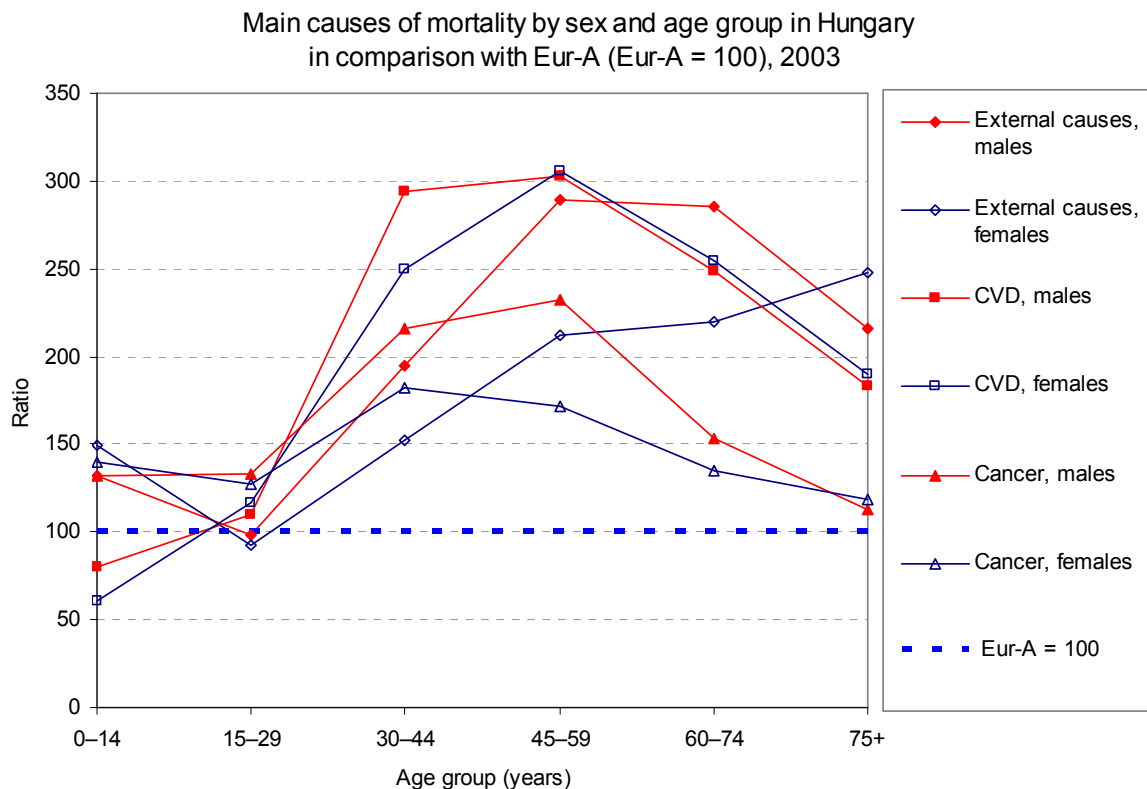
## Main causes of death

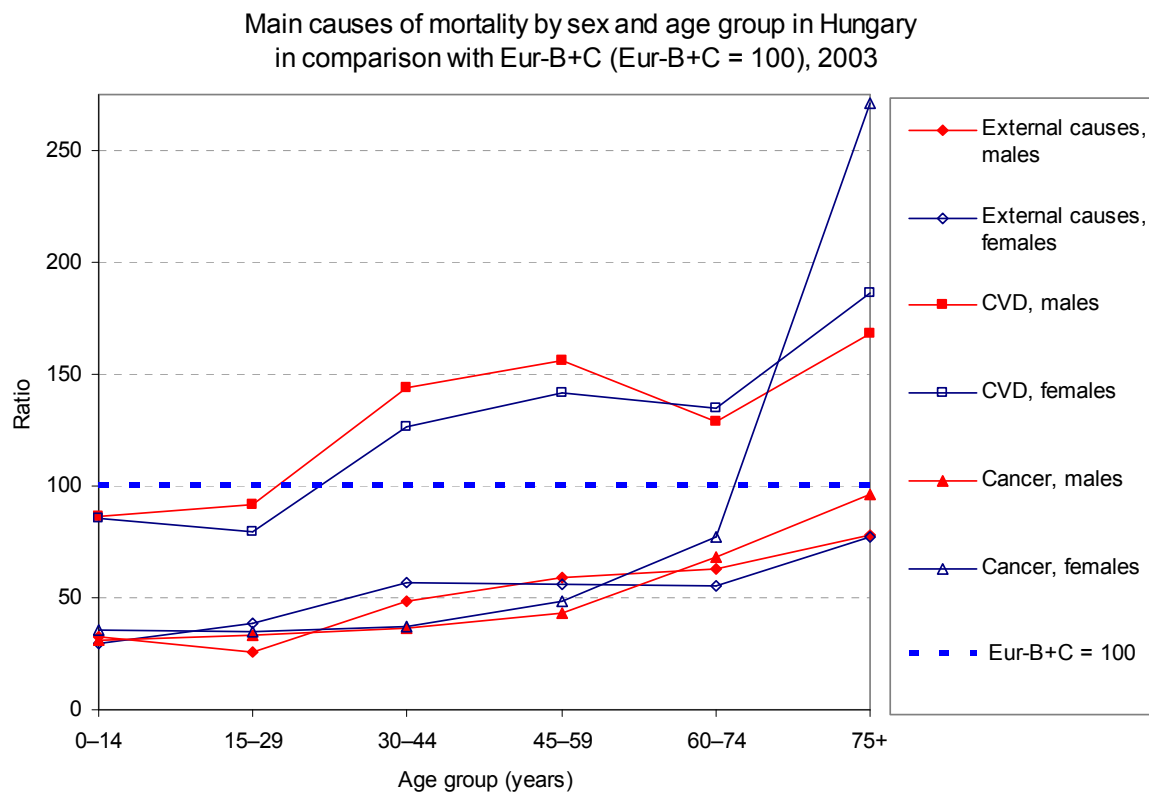
In 2003, selected main noncommunicable diseases accounted for about 87% of all deaths in Hungary, external causes for almost 8% and communicable diseases for 0.4%. In total, 57% of all deaths were caused by diseases of the circulatory system and 25% by cancer. (Annex. Selected mortality. Annex. Mortality data)

Hungarians have a lower risk of dying from CVDs than the Eur-B+C average in all age groups for both sexes. Compared to Eur-A average, the Hungarian rates are higher in all age groups excluding the youngest (0–14 years), for which the death is a very rare event. CVD mortality in the 30–74 year-old range is from two to three times the Eur-A average.

The risk of dying from cancer is below the Eur-B+C average for people under 30 years old, but above average for the other groups, and higher than the Eur-A average in all age groups, especially among males 30–59 years-old, whose risk is at least double.

Excluding Hungarian elderly, deaths from external causes and poisoning are less common than in the Eur-B+C countries in general. However, Hungarians have higher death rates than the Eur-A average from these causes in all age groups, excluding males and females 15–29 years-old. For all people 45 and over, the death rates are more than double the Eur-A average.



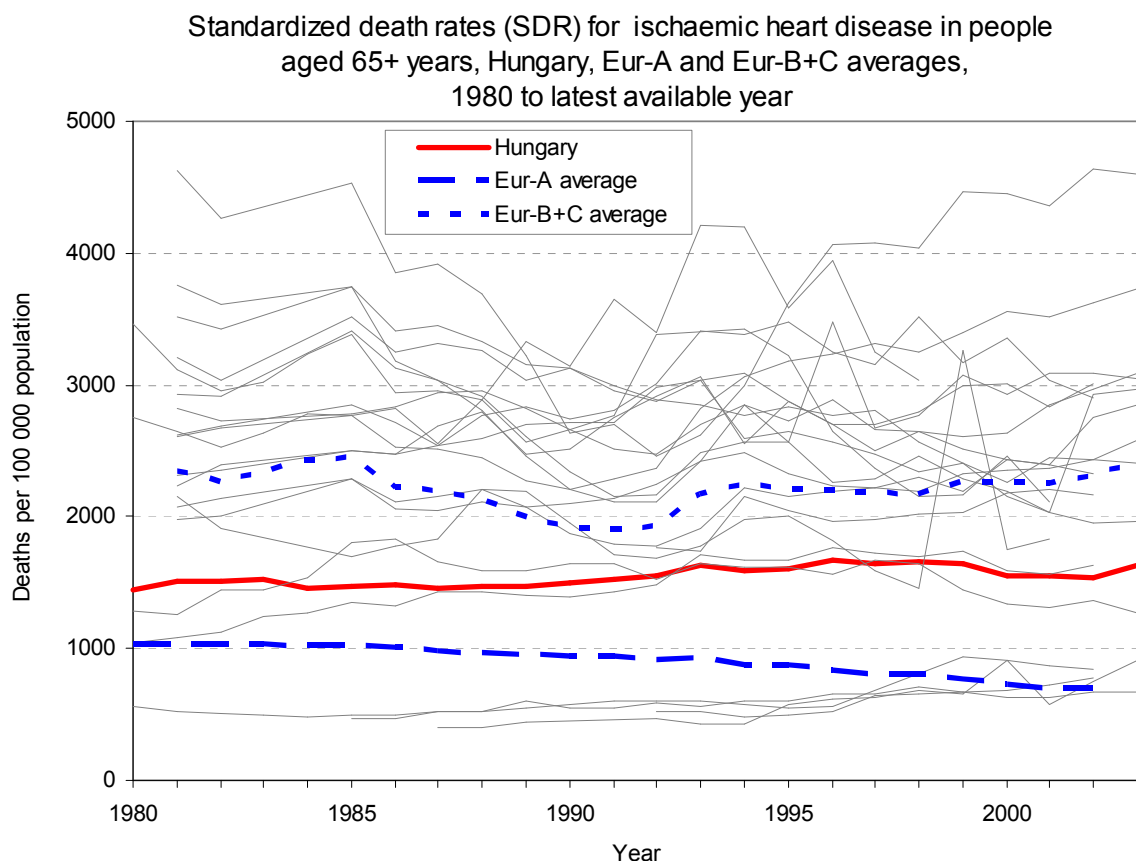


### CVD

Mortality for CVD has decreased in both Hungary and Eur-A since 1980. Hungarian boys and girls under 15 years old have lower death rates than the Eur-A average. For all older age groups, the Hungarian rates are declining, but remain higher than the Eur-A average. The gap between Hungary and the Eur-B+C average is widening, since mortality rates are increasing in the Eur-B+C region in general.

Ischaemic heart disease is the single biggest killer in Hungary, causing 22.2% of all deaths in 2003. Its mortality rates follow the same trend as for total CVD mortality, with the exception of the elderly, whose death rates are now higher than those of the 1980s.

The death rates for cerebrovascular diseases are declining for both sexes in all age groups.



## Cancer

Cancer causes every fourth death in Hungary. In spite of the recent improvements, the premature death rate among Hungarians under 65 years old is the highest in the WHO European Region, for both males and females. The same is true for males in all age groups. Hungary has the second highest total cancer mortality rate in women, after Denmark.

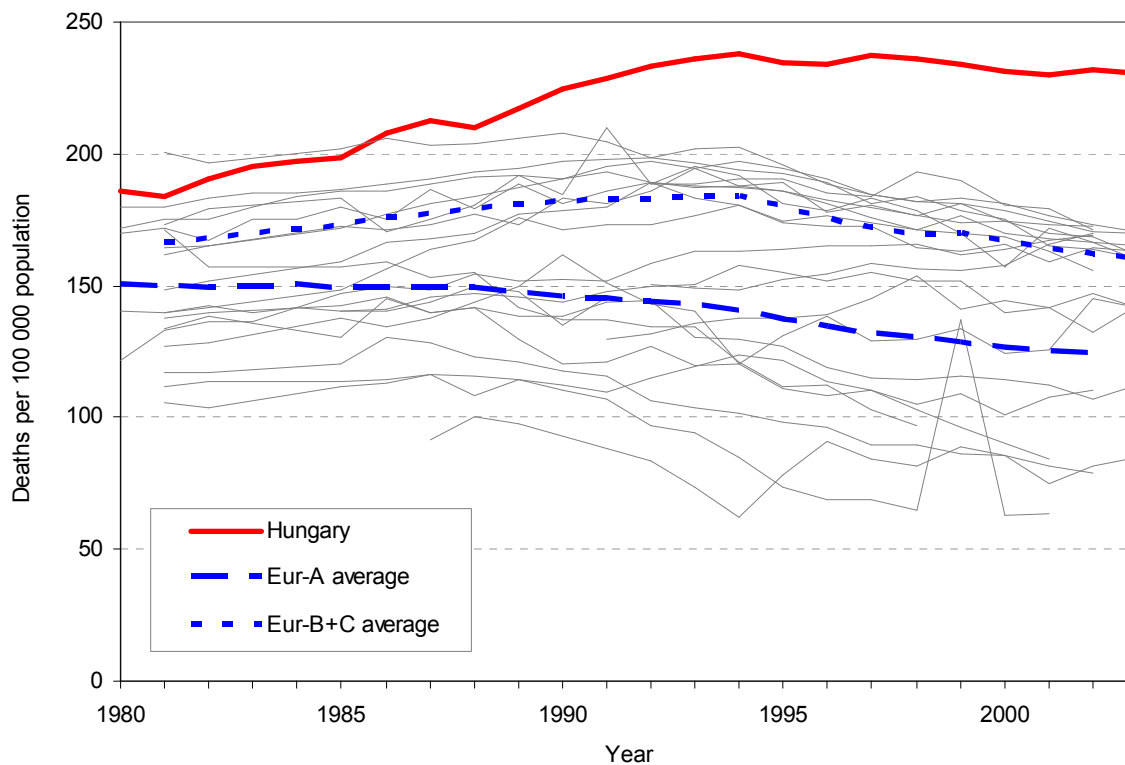
Hungarians under 30 years old have had decreasing cancer death rates for more than two decades, and the most recent rates are between the Eur-A and Eur-B+C averages. In the 30–44 age group, the decline started in the mid-1990s, but the rates are still high: for men they are the highest and for women the second highest in the WHO European Region. Hungarians 45–59 years old have the highest mortality in the WHO European Region, stagnating for males and increasing for females. The rates for elderly Hungarians are decreasing, but are the highest in the Region for both sexes in the 60–74 group.

Hungarians have the highest death rates in the WHO European Region for lip, colorectal, laryngeal, tracheal, bronchial and lung cancers. Pancreatic and breast cancer mortality are the second and fourth highest in the region, respectively.

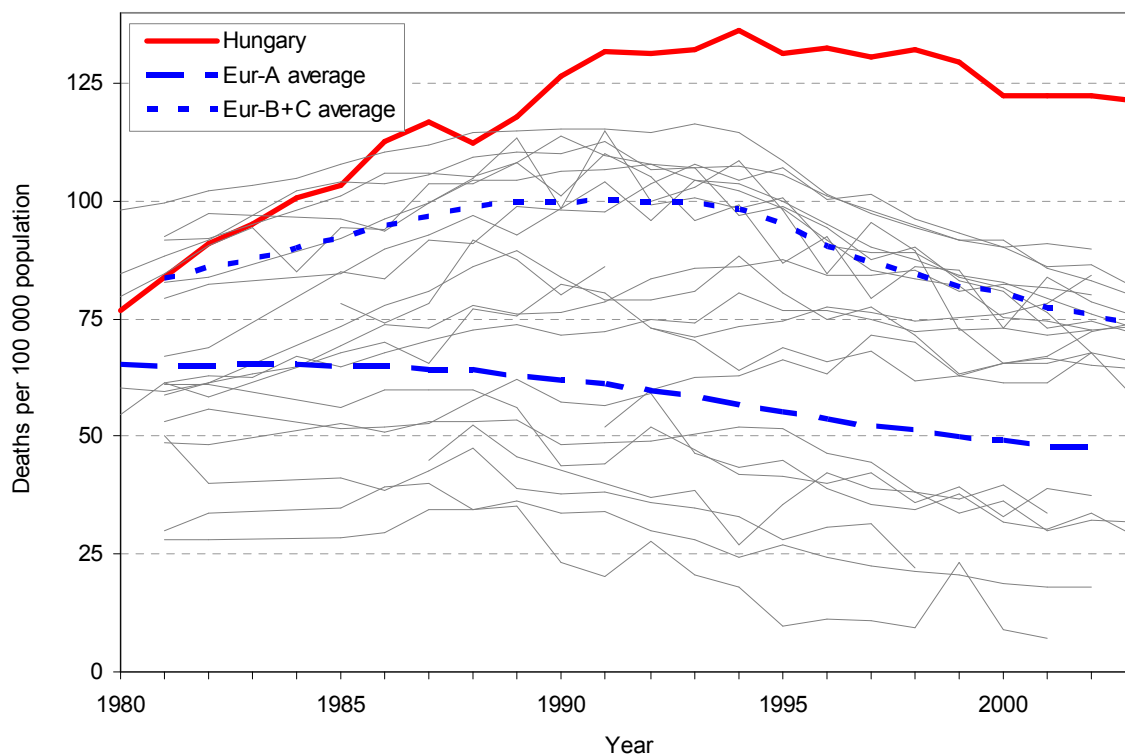
For several cancers, the Hungarian rates are either stagnating (skin, liver and oesophageal) or increasing (colorectal, lip and pancreatic). The death rates from breast, prostate, bladder, and lymphoid and haematopoietic cancers are also above the Eur-A and Eur-B+C averages, but the mortality rates have declined since the mid-to-late 1990s. The death rates from cancers in female reproductive organs have been declining for more than two decades, and the most recent rates equal the Eur-B+C average for cervical and uterine cancers and the Eur-A average for ovarian cancer.

The development laryngeal, tracheal, bronchial and lung cancer mortalities has been different for men and women. For men, the rates started to decrease in the mid-1990s, even though the decline has slowed lately. For women, the rates more than doubled between the early 1980s and 2003, and the current rate is almost twice the Eur-B+C average, and three times the Eur-A average. These mortality patterns reflect the trends in smoking. The proportion of daily smokers among males 15 and older has declined to 40%, while for females it has increased to 28%.

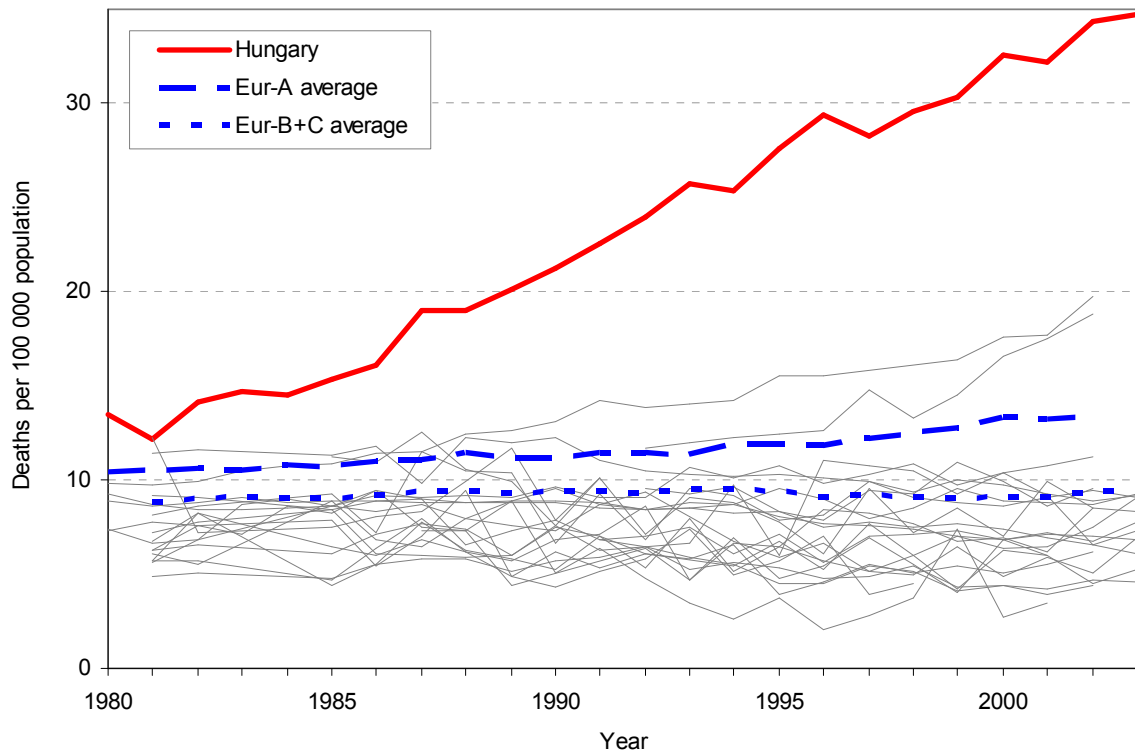
SDR for cancer in people aged 25–64 years, Hungary,  
Eur-A and Eur-B+C averages, 1980 to latest available year



SDR for larynx, trachea, bronchus and lung cancer in males aged 25–64 years,  
Hungary, Eur-A and Eur-B+C averages, 1980 to latest available year



SDR for larynx, trachea, bronchus and lung cancer in females aged 25–64 years, Hungary, Eur-A and Eur-B+C averages, 1980 to latest available year

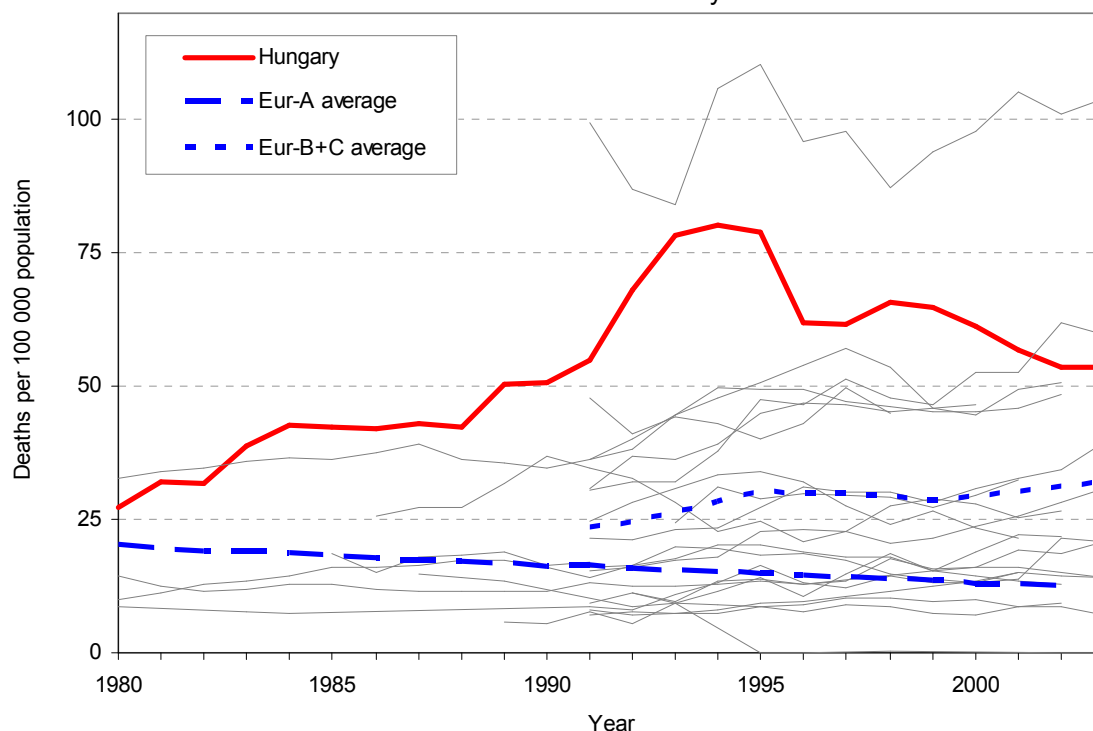


### ***Other causes of death (diseases and medical conditions)***

Hungary has increasing death rates from endocrine, nutritional, metabolic, nervous system and sense organ diseases, due to increased mortality from diabetes mellitus, Alzheimer's disease and other degenerative diseases of nervous system. These trends affect most elderly people, with greater impact on men.

The death rates from diseases of the digestive system have been high in Hungary. Despite a significant decrease since the mid-1990s (partly caused by changes in coding practices in cause-of-death statistics after introduction of ICD-10 classification), the Hungarian rates are among the highest in the WHO European Region. This trend follows chronic liver disease and cirrhosis mortality, which affect men at three times the rate for women. The death rates are the highest in the 45–74 year-old group.

SDR for chronic liver disease and cirrhosis in people of all ages,  
Hungary, Eur-A and Eur-B+C averages,  
1980 to latest available year



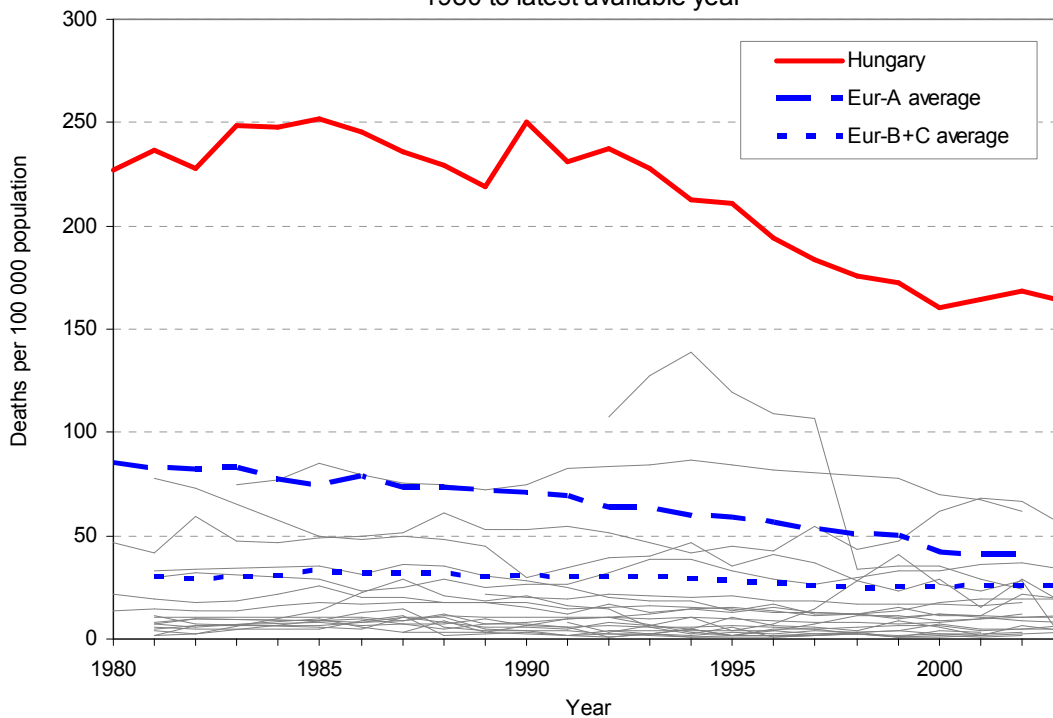
### External causes

Mortality from external causes and poisoning decreased by one-third in Hungary between 1990 and 2003, and has remained below the Eur-B+C average since 1992. Mortality rates are declining for all accidents, transport accidents, motor vehicle traffic accidents, accidental drowning, deaths from exposure to smoke, fire and flames and accidental poisoning.

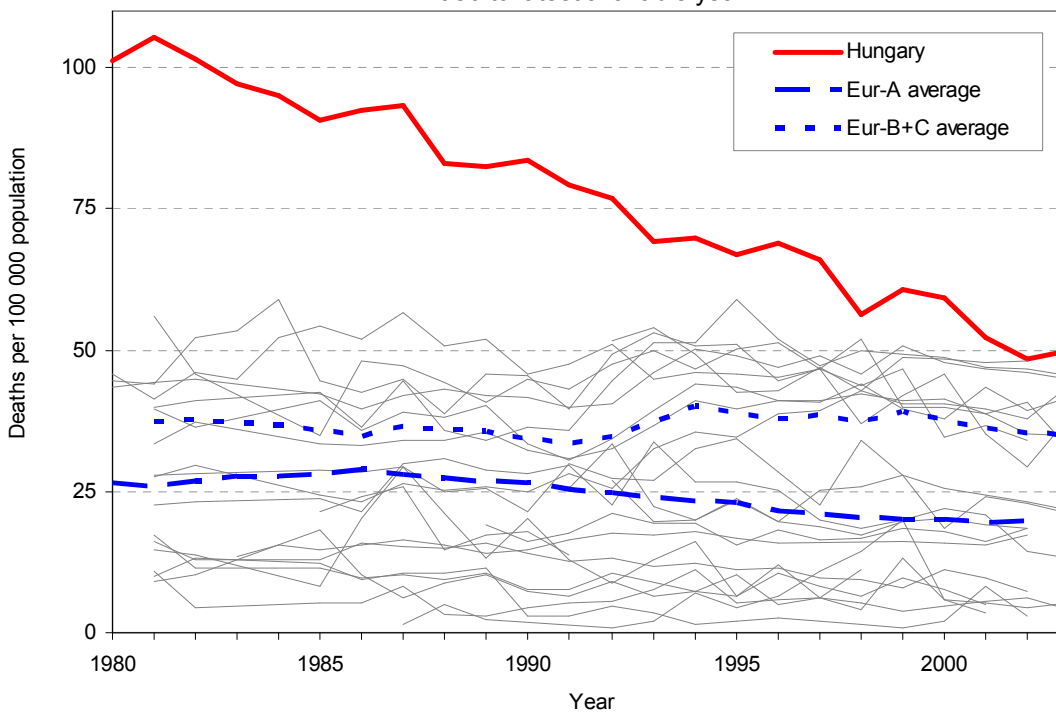
In the under 30 year-old group, this rate has decreased to the Eur-A average. It is also decreasing in the 30–74 year-old group, but remains between the Eur-A and Eur-B+C averages. Accidental deaths claim men more frequently than women, but the trends have been similar for both sexes. The trends in the oldest age group (75 years or more) are sex-specific, with a slower rate of decrease for men than for women. Elderly Hungarian men and women have the highest mortality rate from external causes and poisonings in the WHO European Region, due to accidental falls and suicides, which are both the highest rates in the Region. The most recent rates are seven-fold (accidental falls) and three-fold (suicide) the Eur-A average, despite decreasing trends.

Hungary had the highest suicide rate in the WHO European Region in the 1970s, but it has declined constantly since the mid-1980s, and currently several new European Union Member States and newly independent states have higher suicide rates than Hungary. Since 1980, the suicide rate has declined for all age groups by more than one-third. For people 15–29 years old and 75 and over, the suicide rate has more than halved. The decline has been larger among women (–60% between 1980 and 2003) than among men (–37%).

SDR for accidental falls in people aged 65+ years, Hungary, Eur-A and Eur-B+C averages, 1980 to latest available year



SDR for suicide and self-inflicted injury in people aged 65+ years, Hungary, Eur-A and Eur-B+C averages, 1980 to latest available year



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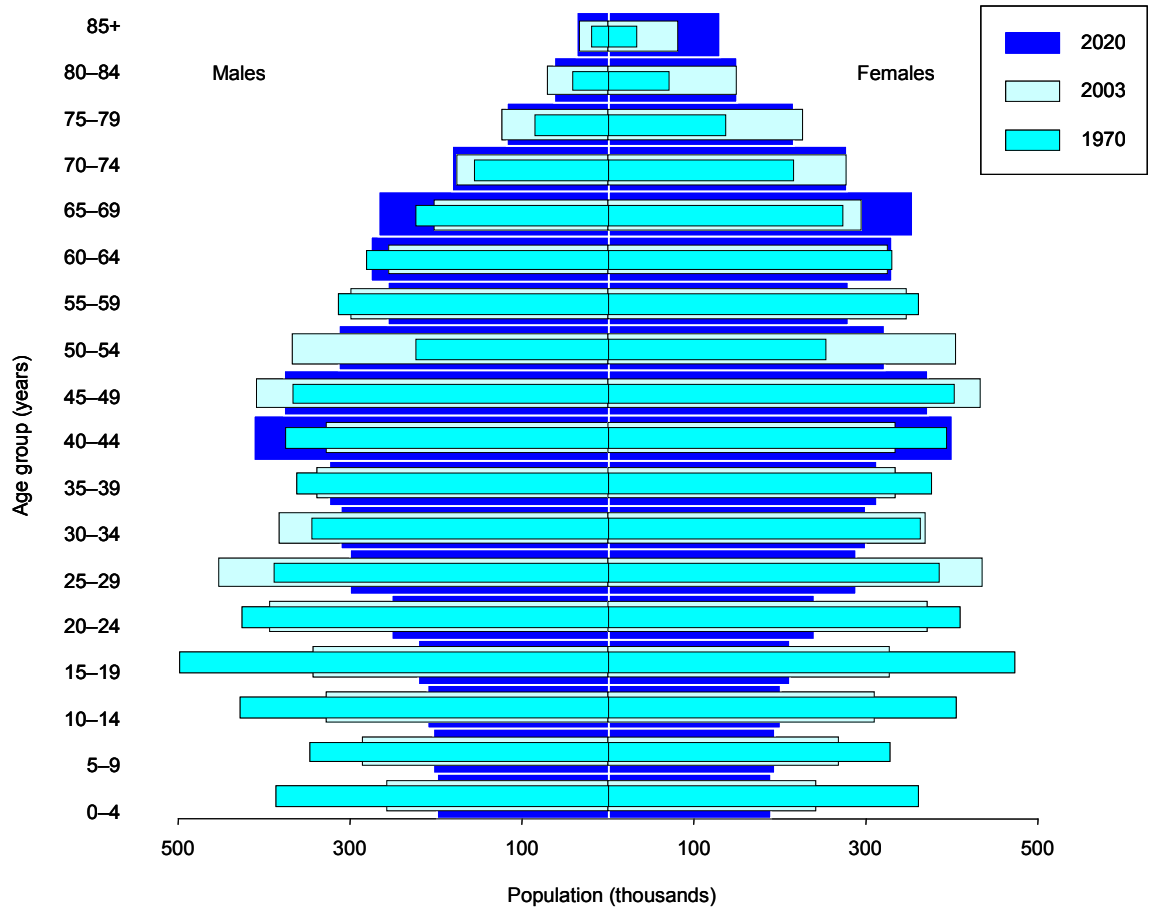
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# Annexes

## Annex. Age pyramid

### Age pyramid for Hungary



Sources: WHO Regional Office for Europe (2005) and United Nations (2005).

## Annex. Selected mortality

## Selected mortality in Hungary compared with Eur-A or B+C averages

Condition	SDR per 100 000		Excess mortality in Hungary (%)	Total deaths in Hungary (%)	Total deaths in Eur-B+C (%)	Eur-A average	Excess Hungary to Eur-A (%)	Total deaths in Eur-A (%)
	Hungary (2003)	Eur-B+C average (2003)						
<b>Selected non-communicable conditions</b>	915.3	1044.9	-12.4	87.3	79.6	533.8	71.5	82.4
<i>Cardiovascular diseases</i>	508.3	741.8	-31.5	48.5	56.5	243.4	108.8	37.6
Ischaemic heart disease	232.7	362.7	-35.8	22.2	27.6	95.9	142.6	14.8
Cerebrovascular diseases	134.6	221.7	-39.3	12.8	16.9	61.1	120.3	9.4
Diseases of pulmonary circulation and other heart disease	39.9	68.9	-42.1	3.8	5.3	56.6	-29.5	8.7
<i>Malignant neoplasms</i>	263.8	172.0	53.4	25.2	13.1	181.5	45.3	28.0
Trachea/bronchus/lung cancer	66.5	33.9	96.2	6.3	2.6	37.1	79.2	5.7
Female breast cancer	31.2	22.1	41.2	3.0	1.7	27.0	15.6	4.2
Colon/rectal/anal cancer	38.2	19.0	101.1	3.6	1.4	20.7	84.5	3.2
Prostate	25.8	14.3	80.4	2.5	1.1	25.1	2.8	3.9
<i>Respiratory diseases</i>	41.4	63.1	-34.4	4.0	4.8	47.8	-13.4	7.4
Chronic lower respiratory diseases	30.7	31.2	-1.6	2.9	2.4	20.2	52.0	3.1
Pneumonia	7.2	23.6	-69.5	0.7	1.8	16.2	-55.6	2.5
<i>Digestive diseases</i>	79.9	52.3	52.8	7.6	4.0	30.8	159.4	4.8
Chronic liver disease and cirrhosis	53.5	32.0	67.2	5.1	2.4	12.6	324.6	1.9
<i>Neuropsychiatric disorders</i>	21.8	15.7	38.9	2.1	1.2	30.3	-28.1	4.7
<b>Communicable conditions</b>	4.0	20.8	-80.8	0.4	1.6	8.4	-52.4	1.3
AIDS/HIV	0.1	0.8	-87.5	0.0	0.1	1.1	-90.9	0.2
<b>External causes</b>	80.0	139.6	-42.7	7.6	10.6	40.3	98.5	6.2
<i>Unintentional</i>	53.3	102.2	-47.8	5.1	7.8	28.7	85.7	4.4
Road traffic injuries	13.4	14.7	-8.8	1.3	1.1	9.9	35.4	1.5
Falls	23.6	7.5	214.7	2.3	0.6	6.1	286.9	0.9
<i>Intentional</i>	26.7	37.4	-28.6	2.5	2.9	11.6	130.2	1.8
Self-inflicted (suicide)	24.8	23.2	6.9	2.4	1.8	10.6	134.0	1.6
Violence (homicide)	1.9	14.2	-86.6	0.2	1.1	1.0	90.0	0.2
<b>Ill-defined conditions</b>	1.3	64.0	-98.0	0.1	4.9	20.9	-93.8	3.2
<b>All causes</b>	1048.0	1312.2	-20.1	100.0	100.0	647.8	61.8	100.0

## Annex. Mortality data

Table 1. Selected mortality for the group 0–14 years by sex in Hungary and Eur-B+C:  
SDR per 100 000 population and percentage changes from 1995 to latest available year

Causes of death	Sex	Hungary (2003)		Eur-A (2002)		Eur-B+C (2003)	
		Rate	Change (%)	Average	Change (%)	Average	Change (%)
<b>All causes</b>	Both	74.1	-3.7	49.4	-2.4	151.7	-3.8
	M	81.0	-4.0	55.3	-2.5	170.5	-3.9
	F	66.7	-3.2	43.3	-2.4	131.9	-3.8
<i>Infectious and parasitic diseases</i>	M	0.5	-10.4	1.4	-1.1	10.9	-7.0
	F	0.3	-9.6	1.1	-3.0	9.5	-6.6
Intestinal infectious diseases	M	0.2	-9.5	0.2	-0.7	5.1	-8.2
	F	0.0	-12.5	0.1	-7.3	4.7	-7.9
<i>Malignant neoplasms</i>	M	4.4	-2.3	3.3	-1.8	5.1	-1.9
	F	3.6	-4.4	2.6	-1.8	4.2	-1.9
<i>Cardiovascular diseases</i>	M	1.1	-3.9	1.4	-3.1	3.3	1.1
	F	0.8	-0.7	1.3	-2.5	2.6	0.1
<i>Respiratory diseases</i>	M	3.8	-5.0	1.4	-4.3	35.9	-5.0
	F	2.8	-5.0	1.0	-4.2	30.7	-5.0
Pneumonia	M	2.2	-4.8	0.5	-6.0	20.9	-4.9
	F	2.0	-4.1	0.4	-5.1	17.9	-4.7
<i>Certain conditions originating in perinatal period</i>	M	485.9	-3.6	255.3	-2.1	607.6	-2.7
	F	396.7	-3.3	202.3	-1.6	427.5	-2.7
Congenital malformations & chromosomal abnormalities	M	16.0	-4.8	11.6	-2.9	24.2	-2.8
	F	13.3	-4.2	10.0	-3.3	21.0	-2.6
<i>Ill-defined causes</i>	M	2.4	21.7	5.0	-3.9	5.6	-0.6
	F	1.5	-0.5	3.4	-4.2	4.6	-1.0
<i>External causes of injury &amp; poisoning</i>	M	9.0	-5.0	7.0	-4.0	29.0	-3.4
	F	6.5	-3.3	4.6	-3.2	18.1	-3.1
Road traffic injuries	M	2.1	-7.4	2.5	-4.5	4.7	-2.6
	F	1.9	-4.4	1.7	-4.8	3.0	-1.6

Table 2. Selected mortality for the group 15–29 years by sex in Hungary and Eur-B+C:  
SDR per 100 000 population and percentage changes from 1995 to latest available year

Causes of death	Sex	Hungary (2003)		Eur-A (2002)		Eur-B+C (2003)	
		Rate	Change (%)	Average	Change (%)	Average	Change (%)
<b>All causes</b>	Both	54.7	-3.5	56.0	-2.3	161.0	-0.9
	M	79.0	-3.6	82.0	-2.3	241.7	-1.0
	F	29.4	-3.4	29.3	-2.2	79.0	-0.6
<i>Infectious and parasitic diseases</i>	M	0.4	-7.6	1.2	1.5	12.3	3.0
	F	0.1	-10.9	0.8	1.9	5.1	2.5
<i>Malignant neoplasms</i>	M	8.1	-1.6	6.2	-1.0	8.8	-1.9
	F	6.1	-0.5	4.7	-1.4	7.7	-1.9
<i>Cardiovascular diseases</i>	M	4.5	-5.9	4.1	-2.4	17.6	0.0
	F	2.8	-3.5	2.3	-2.0	7.3	-0.9
<i>Respiratory diseases</i>	M	2.2	3.7	1.4	-3.6	6.9	0.2
	F	1.4	-1.4	0.9	-2.7	3.8	-1.1
<i>Digestive diseases</i>	M	1.8	-8.6	0.9	-3.5	8.0	3.0
	F	0.9	-8.5	0.5	-3.8	3.7	3.1
<i>Ill-defined causes</i>	M	0.2	-7.4	4.0	-3.1	11.6	7.1
	F	0.0	-12.5	1.4	-1.3	3.3	5.8
<i>External causes</i>	M	54.2	-3.3	58.3	-1.4	162.4	-1.6
	F	12.9	-2.7	14.4	-1.6	36.9	-0.2
Road traffic injuries	M	23.5	-3.8	28.5	-1.3	27.8	-1.5
	F	6.5	-2.1	7.3	-1.4	8.0	0.3
Accidental drowning	M	2.9	-4.1	1.3	-2.2	10.8	-3.9
	F	0.2	-6.1	0.2	-2.1	1.9	-2.2
Accidental poisoning	M	1.4	-2.3	2.8	0.0	19.1	3.3
	F	0.5	2.3	0.7	0.8	4.4	2.5
Self-inflicted (suicide)	M	17.4	-2.3	12.7	-1.8	36.8	0.0
	F	3.3	-3.9	3.1	-2.2	5.8	-1.3

Table 3. Selected mortality for the group 30–44 years by sex in Hungary and Eur-B+C:  
SDR per 100 000 population and percentage changes from 1995 to latest available year

Causes of death	Sex	Hungary (2003)		Eur-A (2002)		Eur-B+C (2003)	
		Rate	Change (%)	Average	Change (%)	Average	Change (%)
<b>All causes</b>	Both	246.9	-4.4	120.3	-2.5	453.8	-0.7
	M	349.5	-4.7	161.6	-2.6	700.0	-0.8
	F	145.3	-3.7	78.5	-2.1	215.6	-0.2
<i>Malignant neoplasms</i>	M	57.7	-3.4	27.6	-2.3	40.2	-2.8
	F	55.5	-1.7	31.3	-2.0	43.8	-1.4
Trachea/bronchus/lung cancer	M	14.4	-4.2	5.0	-3.4	7.3	-4.2
	F	8.9	-0.3	2.8	-0.6	2.2	-1.0
Female breast cancer	F	11.5	-1.2	10.0	-2.6	10.0	-2.3
<i>Cardiovascular diseases</i>	M	77.0	-4.7	26.1	-2.5	158.6	-0.4
	F	25.9	-4.3	10.4	-2.1	45.3	0.0
Ischaemic heart disease	M	37.3	-5.9	11.8	-3.1	73.7	-2.2
	F	9.4	-3.7	2.4	-2.7	14.4	-1.3
Cerebrovascular diseases	M	17.4	-4.2	4.4	-3.2	24.6	-0.4
	F	8.2	-5.1	3.6	-2.5	10.6	-1.3
<i>Respiratory diseases</i>	M	9.7	-3.3	3.9	-3.5	34.3	0.9
	F	5.5	0.4	2.2	-2.0	9.8	0.8
<i>Digestive diseases</i>	M	70.8	-6.0	12.6	-2.4	50.2	1.4
	F	23.4	-5.6	5.4	-1.7	19.4	4.1
<i>External causes</i>	M	109.9	-3.6	58.8	-1.2	299.5	-1.9
	F	22.1	-4.3	15.1	-1.8	58.9	-1.0
Road traffic injuries	M	27.0	-1.8	16.0	-0.5	31.4	-1.7
	F	5.8	-1.9	3.9	-2.0	7.1	-0.5
Self-inflicted (suicide)	M	49.0	-3.0	21.2	-1.5	54.9	-2.4
	F	9.6	-4.3	5.8	-2.2	7.9	-2.5

Table 4. Selected mortality for the group 45–59 years by sex in Hungary and Eur-B+C:  
SDR per 100 000 population and percentage changes from 1995 to latest available year

Causes of death	Sex	Hungary (2003)		Eur-A (2002)		Eur-B+C (2003)	
		Rate	Change (%)	Average	Change (%)	Average	Change (%)
<b>All causes</b>	Both	1035.2	-1.9	435.6	-1.3	1294.9	-0.6
	M	1524.7	-2.1	580.1	-1.4	1981.7	-0.6
	F	598.9	-1.4	293.3	-1.0	698.9	-0.5
<i>Malignant neoplasms</i>	M	505.5	0.0	218.2	-1.2	323.2	-1.9
	F	264.0	1.2	155.0	-1.0	186.1	-0.5
Trachea/bronchus/lung cancer	M	182.8	-0.6	65.9	-1.5	101.4	-2.9
	F	61.0	5.0	21.8	3.4	15.4	1.0
Female breast cancer	F	51.1	-0.8	44.0	-2.2	45.3	0.1
<i>Cardiovascular diseases</i>	M	466.2	-2.7	156.4	-2.6	793.1	-0.1
	F	152.1	-3.1	50.9	-2.5	271.7	-0.6
Ischaemic heart disease	M	245.3	-3.0	86.2	-3.3	435.3	-0.7
	F	64.3	-3.2	17.8	-3.4	111.1	-0.6
Cerebrovascular diseases	M	101.5	-3.2	23.7	-2.6	168.6	-0.9
	F	45.3	-3.1	14.5	-2.1	88.4	-1.4
<i>Respiratory diseases</i>	M	45.8	-2.5	20.3	-1.7	108.7	-1.4
	F	22.0	1.5	10.2	-1.3	24.5	-0.7
<i>Digestive diseases</i>	M	246.1	-3.6	49.6	-0.8	129.7	0.7
	F	81.8	-3.4	20.3	-0.7	57.3	1.9
<i>External causes</i>	M	177.7	-2.1	62.8	-1.0	409.2	-0.9
	F	43.5	-1.7	20.9	-0.9	89.1	-1.1
Road traffic injuries	M	28.5	-1.2	13.0	-1.3	28.5	-1.8
	F	7.9	1.6	4.1	-2.1	7.5	-1.4
Self-inflicted (suicide)	M	75.8	-0.7	23.1	-1.1	68.1	-2.4
	F	16.7	-3.5	8.5	-1.2	10.2	-3.4

Table 5. Selected mortality for the group 60–74 years by sex in Hungary and Eur-B+C:  
SDR per 100 000 population and percentage changes from 1995 to latest available year

Causes of death	Sex	Hungary (2003)		Eur-A (2002)		Eur-B+C (2003)	
		Rate	Change (%)	Average	Change (%)	Average	Change (%)
<b>All causes</b>	Both	2738.6	-1.8	1570.9	-1.9	3411.7	-0.1
	M	4048.2	-1.4	2156.9	-2.1	4996.4	0.1
	F	1830.2	-2.2	1069.2	-1.9	2339.0	-0.6
<i>Malignant neoplasms</i>	M	1288.5	-0.4	851.3	-1.4	1002.5	-0.8
	F	591.2	-1.2	439.8	-1.1	438.9	-0.7
Trachea/bronchus/lung cancer	M	447.2	-0.1	261.8	-1.9	321.7	-1.5
	F	105.6	2.3	59.0	0.2	37.1	-1.4
Female breast cancer	F	92.3	-0.7	79.7	-1.6	68.7	1.3
<i>Cardiovascular diseases</i>	M	1817.7	-2.1	744.9	-3.6	2903.0	0.6
	F	836.8	-3.0	335.7	-3.9	1507.8	-0.3
Ischaemic heart disease	M	894.4	-2.1	381.3	-4.2	1582.2	1.2
	F	373.4	-2.3	133.5	-4.6	731.4	0.5
Cerebrovascular diseases	M	489.3	-1.9	143.3	-3.7	833.7	0.2
	F	248.7	-3.3	86.7	-4.1	528.9	-0.8
<i>Respiratory diseases</i>	M	198.1	-2.3	144.0	-3.5	303.0	-2.4
	F	66.8	-1.3	62.5	-2.4	68.6	-3.6
<i>Digestive diseases</i>	M	312.0	-1.9	111.6	-1.6	193.0	0.1
	F	127.0	-1.4	54.1	-1.7	94.2	0.2
<i>External causes</i>	M	218.8	-0.7	79.3	-1.4	320.0	1.0
	F	68.7	-3.6	32.1	-2.1	88.7	-0.5
Road traffic injuries	M	30.5	1.6	14.8	-3.0	24.3	-1.5
	F	7.6	-3.3	5.9	-3.4	9.5	-1.0
Self-inflicted (suicide)	M	73.1	-0.5	24.5	-1.6	60.5	-0.8
	F	18.3	-3.7	8.7	-2.6	12.7	-3.1

Table 6. Selected mortality for the group 75+ years by sex in Hungary and Eur-B+C:  
SDR per 100 000 population and percentage changes from 1995 to latest available year

Causes of death	Sex	Hungary (2003)		Eur-A (2002)		Eur-B+C (2003)	
		Rate	Change (%)	Average	Change (%)	Average	Change (%)
<b>All causes</b>	Both	10816.8	-0.9	8059.6	-1.0	12338.8	0.0
	M	12802.5	-1.0	9832.0	-1.1	14838.0	0.1
	F	9846.4	-0.8	7112.5	-0.9	11421.7	0.0
<i>Malignant neoplasms</i>	M	2506.3	-0.7	2231.1	-0.4	1489.3	1.2
	F	1347.2	-0.9	1136.2	-0.4	721.7	0.8
Trachea/bronchus/lung cancer	M	532.0	-0.1	457.1	-0.7	323.5	1.0
	F	145.5	1.7	102.7	1.5	55.6	0.5
Female breast cancer	F	186.4	0.4	159.6	-0.4	92.0	3.1
<i>Cardiovascular diseases</i>	M	7970.2	-0.9	4356.2	-2.1	10221.2	0.4
	F	6812.0	-0.9	3577.9	-1.9	8805.6	0.4
Ischaemic heart disease	M	3618.0	0.8	1708.0	-2.2	4925.6	1.4
	F	2969.6	1.8	1150.0	-2.2	4028.6	1.2
Cerebrovascular diseases	M	2099.6	-0.8	1119.8	-2.5	3004.4	0.7
	F	1791.3	-1.2	1026.9	-2.4	2967.6	0.5
<i>Respiratory diseases</i>	M	707.6	-3.5	1156.5	-2.4	824.1	-2.1
	F	318.0	-3.4	591.9	-2.1	302.3	-3.2
<i>Digestive diseases</i>	M	365.0	-2.4	340.3	-1.1	270.4	0.3
	F	313.9	0.9	279.8	-0.4	175.0	1.1
<i>External causes</i>	M	579.9	-2.4	275.0	-0.6	604.2	0.1
	F	467.7	-2.7	187.8	-1.2	172.4	-1.2
Road traffic injuries	M	37.0	-4.2	28.1	-2.2	34.6	-3.1
	F	10.1	-3.6	10.0	-3.1	14.7	-1.7
Self-inflicted (suicide)	M	118.7	-3.8	49.5	-1.6	86.6	-1.1
	F	37.4	-4.3	11.8	-3.2	22.4	-1.9

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## Technical notes

### Calculation of averages

Averages for the reference group, when based on data in the European health for all database of the WHO Regional Office for Europe, are weighted by population. Some countries with insufficient data may be excluded from the calculation of averages. Otherwise, for data from other sources, simple averages have been calculated where required.

To smooth out fluctuations in annual rates caused by small numbers, three-year averages have been used, as appropriate. For example, maternal mortality, usually a small number, has three-year moving averages calculated for all countries. When extreme fluctuations are known to be due to population anomalies, data have been deleted, as appropriate.

### Data sources

To make the comparisons as valid as possible, data for each indicator have, as a rule, been taken from one source to ensure that they have been harmonized in a reasonably consistent way. Unless otherwise noted, the source of data for figures and tables in this report is the January 2005 version of the European health for all database of the WHO Regional Office for Europe. The health for all database acknowledges the various primary sources of the data.

In cases where current census data for national population are unavailable, coupled with ongoing migrations of people in and out of countries, UN estimates or provisional figures supplied by the country are used to approximate national population. Such population figures create uncertainty in standardized death rates.

### Disease coding

Case ascertainment, recording and classification practices (using the ninth and tenth revisions of the International Statistical Classification of Diseases and Related Health Problems: ICD-9 and ICD-10, respectively), along with culture and language, can influence data and therefore comparability across countries.

### Healthy life expectancy (HALE) and disability-adjusted life-years (DALYs)

HALE and DALYs are summary measures of population health that combine information on mortality and non-fatal health outcomes to represent population health in a single number. They complement mortality indicators by estimating the relative contributions of different causes to overall loss of health in populations.

DALYs are based on cause-of-death information for each WHO region and on regional assessments of the epidemiology of major disabling conditions. The regional estimates have been disaggregated to Member State level for the highlights reports.

National estimates of HALE are based on the life tables for each Member State, population representative sample surveys assessing physical and cognitive disability and general health status, and on detailed information on the epidemiology of major disabling conditions in each country.

More explanation is provided in the statistical annex and explanatory notes of *The world health report 2003*<sup>1</sup>.

### Limitations of national-level data

National-level averages, particularly when they indicate relatively good positions or trends in health status, as is the case in most developed countries, hide pockets of problems. Unless the health status of a small population is so dramatically different from the norm that it influences a national indicator, health risks and poorer health outcomes for small groups will only become evident through subnational data.

### Reference groups for comparison

When possible, international comparisons are used as one means of assessing a country's comparative strengths and weaknesses and to provide a summary assessment of what has been achieved so far and

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<sup>1</sup> WHO (2003). *The world health report 2003 – Shaping the future*. Geneva, World Health Organization (<http://www.who.int/whr/2003/en>, accessed 10 June 2005).

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what could be improved in the future. Differences between countries and average values allow the formulation of hypotheses of causation or imply links or remedies that encourage further investigation.

The country groups<sup>1</sup> used for comparison are called reference groups and comprise:

- countries with similar health and socioeconomic trends or development; and/or
- geopolitical groups.

The 27 countries with very low child mortality and very low adult mortality are designated Eur-A by WHO. Eur-A comprises Andorra, Austria, Belgium, Croatia, Cyprus, the Czech Republic, Denmark, Finland, France, Germany, Greece, Iceland, Ireland, Israel, Italy, Luxembourg, Malta, Monaco, the Netherlands, Norway, Portugal, San Marino, Slovenia, Spain, Sweden, Switzerland and the United Kingdom. However, data for most indicators are unavailable for two of the 27 countries: Andorra and Monaco. Therefore, unless otherwise indicated, Eur-A and averages for Eur-A refer to the 25 countries for which data are available.

The 25 countries with low child mortality and low or high adult mortality are designated Eur-B+C by WHO. Eur-B+C comprises Albania, Armenia, Azerbaijan, Belarus, Bosnia and Herzegovina, Bulgaria, Estonia, Georgia, Hungary, Kazakhstan, Kyrgyzstan, Latvia, Lithuania, Poland, Republic of Moldova, Romania, Russian Federation, Serbia and Montenegro, Slovakia, Tajikistan, Turkey, Turkmenistan, Ukraine, and Uzbekistan. Unless otherwise indicated, Eur-B+C and averages for Eur-B+C refer to these countries.

Comparisons should preferably refer to the same point in time, but the countries' latest available data are not all for the same year. This should be kept in mind as a country's position may change when more up-to-date data become available.

Graphs have usually been used to show time trends from 1980 onwards. These graphs present the trends for all the reference countries as appropriate. Only the country in focus and the group average are highlighted and identified in the legend. This enables the country's trends to be followed in relation to those of all the reference countries, and performance in relation to observable clusters and/or the main trend or average to be recognized more easily.

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<sup>1</sup> WHO (2004). *The world health report 2004 – Changing history*. Geneva, World Health Organization (<http://www.who.int/whr/2004/en>, accessed 26 August 2004).

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## Glossary

### Causes of death

Causes of death	ICD-10 code
Cerebrovascular diseases	I60–I69
Chronic liver disease and cirrhosis	K70, K73, K74, K76
Chronic obstructive pulmonary disease	J40–J47
Colon/rectal/anal cancer	C18–C21
Diseases of pulmonary circulation and other heart disease	I26–I51
Falls	W00–W19
Female breast cancer	C50
Ischaemic heart disease	I20–I25
Pneumonia	J12–J18
Prostate cancer	C61
Neuropsychiatric disorders	F00–99, G00–99, H00–95
Road traffic injuries	V02–V04, V09, V12–V14, V19–V79, V82–V87, V89
Self-inflicted (suicide)	X60–X84
Trachea/bronchus/lung cancer	C33–C34
Violence	X85–Y09

### Technical terminology

Disability-adjusted life-year (DALY)	The DALY combines in one measure the time lived with disability and the time lost due to premature mortality. One DALY can be thought of as one lost year of healthy life.
GINI index	Measures inequality over the entire distribution of income or consumption. A value of 0 represents perfect equality; a value of 100, perfect inequality. Low levels in the WHO European Region range from 23 to 25; high levels range from 35 to 36. <sup>1</sup>
Healthy life expectancy (HALE)	HALE summarizes total life expectancy into equivalent years of full health by taking account of years lived in less than full health due to diseases and injuries.
Income poverty line (50% of median income)	The percentage of the population living below a specified poverty line: in this case, with less than 50% of median income.
Life expectancy at birth	The average number of years a newborn infant would live if prevailing patterns of mortality at the time of birth were to continue throughout the child's life.
Natural population growth	The birth rate less the death rate
Neuropsychiatric conditions	Mental, neurological and substance use disorders
Population growth	(The birth rate less the death rate) + (immigration less emigration)
Standardized death rate (SDR)	The age-standardized death rate calculated using the direct method: that is, it represents what the crude rate would have been if the population had the same age distribution as the standard European population.

<sup>1</sup>WHO Regional Office for Europe (2002). *The European health report 2002*. Copenhagen, WHO Regional Office for Europe:156 (<http://www.euro.who.int/europeanhealthreport>, accessed 28 May 2004).