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ADVERT



# REFLECTIONS ON THE AGEING IN THE TROPICAL WORLD

H. M. GILLES

In the last few decades, significant changes have occurred in the pattern of health and disease in many developing countries. These changes have resulted from the effects of demographic, social, economic and technological developments. Developing countries can be classified into three broad groups on the basis of their health profiles.

## a. Traditional epidemiological pattern

In these countries, parasitic and infectious diseases, acute respiratory-tract diseases and malnutrition still occur frequently as major causes of morbidity and mortality; child and maternal mortality rates are high, fertility rate is high and expectation of life at birth low - e.g. the least developed countries of the world.

## b. Transitional pattern (Health in transition)

These countries are undergoing rapid demographic and epidemiological changes: infant, child and maternal mortality rates are declining, fertility rates are high but falling, life expectancy is rising. Parasitic and infectious diseases are still prevalent but chronic degenerative diseases associated with modern lifestyles and ageing populations are increasing. In some cases, countries carry a double burden: they are acquiring modern health problems while traditional ones persist. e.g. the wealthier countries of Africa. Thus, one out of twenty Africans, is 60 years or older. Men reaching age 60 can expect 14 more years of life and women 16 more. As the tempo of ageing in developing countries is more rapid than in the developed countries, developing countries will have less time to adapt to the consequences of population ageing. (United Nations 2002)

## c. Developed country pattern

In these countries fertility rates and infant, child and maternal mortality are low; life expectancy at birth is high - 78 years for men and 82 years for women - cancer, cardiovascular, neurological and mental disorders, degenerative diseases and problems associated with the changed life style and behaviour are common e.g. the 'tiger economics' of South East Asia.

In addition to the demographic changes which bring the health problems of the elderly into prominence, ecological changes in developing countries contribute to the changing pattern of disease. Industrialisation, uncontrolled urbanisation, atmospheric pollution, changes in diet, a more sedentary life, use of tobacco products, and accidents have increased the risk of heart disease, hypertension, stroke, (Imam 2002) cancer, diabetes and disability.

In 1998, 39% of daily adjusted life years (DALY's) were attributable to noncommunicable diseases (WHO 1999). The massive pandemic of HIV / AIDS especially in sub-Saharan Africa, has resulted in old people being left to care for their young grandchildren.

The global epidemic of diabetes is well documented (King 1993); thus in the urbanised Micronesians of Nauru nearly one half of the population (41.2% males; 41.5% females) in the age range 30 - 64 have diabetes. WHO estimates that smoking causes about 4 million deaths annually world wide. There are about 1.15 billion smokers in the world to-day consuming an average of 14 cigarettes each per day. Of these smokers, 82% live in low and middle income countries and consumption is increasing in developing countries by about 3.4% per annum (WEIO 1997). Fig. 1. Overall, smoking prevalence among men in developing countries is about 48%.

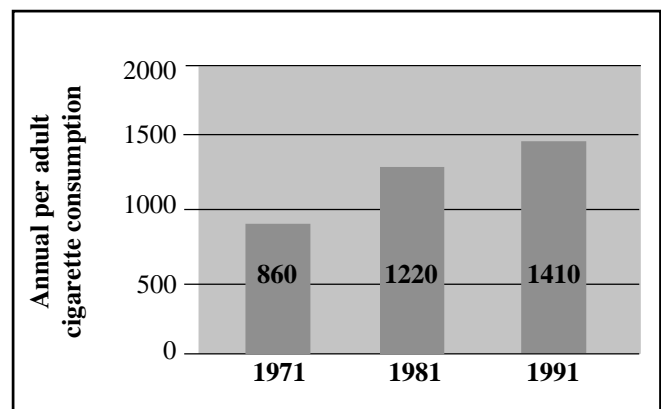


Fig.1 - Trends per capita cigarette consumption 1971, 1981 and 1991 in low and middle-income countries.



Tobacco smoking accounts for many deaths from lung cancer, cardiovascular and chronic respiratory diseases. Neuropsychiatric disorders are probably underestimated, when one considers that traditional family ties are undergoing substantial changes in some tropical societies.

#### **d. Demographic Trends in the developing world**

The speed and significance of population ageing in the less developing countries has only recently been appreciated. Thus, it is estimated that by 2025, some 840 million people over the age of 60 will live in developing countries - 70% of all older people world wide (WHO 2001). In India and Indonesia two of the most highly populated countries in the world 21% and 22% of the population will be 60 years or over by 2050.

It took France 115 years to double its elderly population, in contrast China will only take 27 years to achieve the same increase. The decadal per cent growth in the elderly population for the period 1991 - 2001 in India was close to 40. (Prakash 99) In Zambia in 1990 there were 216,196 people aged 65 years and older, by 2050 the numbers will be 1,452,706, a five fold increase in 60 years. (Kamwengo 1999)

#### **e. Border of non-communicable diseases**

The growth of the non-communicable diseases - neuropsychiatric disease and accidents is progressing even in the less developed countries.

The leading cause of death in old age in India is cardiovascular disease. In 1996 the number of hypertensives was nearly 9 million; an estimated 5 million were diabetic. Crude prevalence rate of stroke was around 200 per 100,000. In Africa, stroke represents 15% of hospital admissions and is a major contributor to mortality in both urban and rural areas. (Walker et al 2000). Under nutrition is common in the elderly.

The prevalence rate of mental morbidity among 60 year olds and above was estimated at 89 per 1000. (Prakash 1999). These estimates undoubtedly fall far short of reality.

#### **CONCLUSION**

The issues of the elderly in the tropical world are increasingly being addressed and justifiably so. (Islamic Organisation for Medical services 1999; Global action on Aging 2002). Planning for the future in relation to their rights, their care, their social economic and mental well-being cannot be postponed.

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# Ageing, Support and Care in Africa: How Feasible are High Standards in Low Economics?

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## *Abstract*

*Africa is the largest continent and the world's poorest region. Chronic poverty, scarcity, humanitarian crises, disease and epidemics are realities of the context in which Africans grow old. In addition, urbanisation and other demographic forces are propelling social change which impacts family structures and their capacity to sustain individuals in old age. An expansion of formal care and support systems to benefit older persons is unlikely in the near future. Health care services are under-resourced and often inaccessible to older clients. The feasibility of achieving high standards of care in the low economies of African countries is considered with special reference to geriatric care. It is concluded that indigenous solutions and strategies need to be developed to meet the support and care needs of older Africans.*

## **Introduction**

African countries are notoriously high on low economies and low on high standards - relative to Western countries. Africa is the world's poorest region: large swathes of the population live in extreme, chronic poverty. Several African governments and economies are hobbled by weak leadership, poor management, global debt, corruption and plunder. Some countries are torn apart by bloody conflict and civil wars. The countries seemingly suffer one natural disaster or calamity after another: droughts, floods, famine, disease. The HIV/AIDS epidemics are impacting all sectors of society and areas of social life. Economic desperation, together with hunger, spawns widespread crime and violence.

In addition, the political and social conditions and ills are exacerbated by social and demographic forces which are bringing wide-sweeping changes to the continent and contributing to destabilization of traditional African values which previously sustained older persons in closely-knit, age-integrated societies. A strong urbanisation trend, or migration of the young to cities in search of job opportunities, is one such force, as is modernisation, a concomitant force. Both processes impact older persons and their care situations in peculiar ways.

Such are realities and emerging issues of ageing in Africa - and the context in which Africans grow old.

## **Ageing in Africa**

Not only are older Africans circumstances and the ways in which they grow old in the continent different when compared to other world regions; so also is the pattern of population ageing different, as well as African countries' capacity to meet the challenges of population ageing.

The region's population of 40 million persons aged 60 years and over in 2000 is projected to increase fivefold, to 205 million, by 2050 (UNPD, 2002). But demographic transition lags, due to sustained high fertility. The percentage of the older section of the total population, 5 percent in 2000, is expected to rise to only 10 percent in five decades (UNPD, 2002). However, the projected increase in the absolute number of older persons is of greater importance, specifically in terms of changes in population structures and dependency ratios, and in particular as a result of the expected demographic, economic and social impact of the HIV/AIDS epidemics. Demographic consequences of the epidemics will include decreases in life expectancy at birth: an expected 48 years overall in 2000-2005, instead of 57 years without AIDS. In the worst



affected countries, all in southern Africa, life expectancy figures are far lower than they would be without AIDS: Botswana: 36 versus 70 years; South Africa: 47 versus 66 years; Swaziland: 38 versus 63 years; and Zimbabwe: 43 versus 69 years (UNPD, 2000).

The continent, particularly the southern sub-region, is experiencing the worst brunt of the global pandemic. In the current five-year period, 13 million excess deaths will occur in 35 African countries as a result of AIDS. The mortality will create expanded old populations and young populations of so-called AIDS orphans. Increased AIDS-related morbidity and mortality in the working-age population are shrinking the size of the workforce and denting economies. Scarce health resources are needing to be shifted to the infected and dying population. The deaths of middle-aged kin, together with weakened economies and thus fewer public resources, are diminishing the capacity of formal and informal support and care systems for older persons. The growing population of AIDS orphans is creating an enormous social burden. Social spending on the poor and elderly is being seriously affected by these demands.

Population ageing, and other demographic and social forces and their impact, are important building blocks of African gerontology. Other building blocks are poverty, particularly of older women, and a lack of social security and inadequate welfare provision; conflict and violence, which lead to displaced and traumatised older citizens and refugees; chronic morbidity and poor access to health care of older persons; gender inequities and the burden of caregiving for older women; rural ageing (75% of African populations are rural based); self-help and income-generation initiatives of older individuals and groups; and societal affirmation of African elderliness and the reintegration of elders in so-called renaissance society. (See Ferreira, 1999a.)

Of all building blocks though, the single most important to African gerontologists is the family and kin support. However, African family structures are changing, although the family as an institution is not disappearing; rather, families are responding and

adapting to new conditions, while older persons are adopting new roles within families.

## Continuities and Discontinuities

Against this background, I select four areas to demonstrate briefly (1) the impact of demographic forces and social change in terms of continuities and discontinuities on ways of life and in old age; and (2) the gap between aspirations to address the needs of older persons and to maintain high standards, given the low priority accorded older persons by governments and scarcity, or few resources as a function of low economies.

### *Income Security*

The first area which I demonstrate is that of income security, of which the vast majority of older Africans has none. No more than 10 percent of the working population, mainly males, is ever employed in the formal sector and may receive a small pension on retirement. The few contributory pension programmes that there are, though, are dogged by non-sustainability due to mismanagement and fraud. (See Kaseke, 2000.)

Only a handful of African countries operate a non-contributory social pension system. South Africa is unique in the virtual universality and relative generosity of its mean-tested old-age pension programme (Ferreira, 2000, 1999b). Other countries which operate similar but less expansive programmes are Namibia, Botswana and Mauritius. However paltry pension income is though, it can mean the difference between survival and starvation, particularly in multi-generational households in which pension-sharing is the norm.

Social security, social provision and social protection are not a common feature of under-developed African security systems. In general, African countries lack infrastructure and resources, as well as the political will and knowledge to establish and sustain such programmes. The governments also tend to argue that state-provided social assistance will crowd out non-formal or traditional support systems, and they therefore continue to devolve



responsibility for the care of elders on families. (See Gorman, 2000.)

For nine in ten Africans, the concept of "retirement" is unknown; they continue economic activity until they perceive they are "too old to work". The majority, particularly women, engage in petty trading (see Apt, Koomson, Williams & Grieco, 1995; Mupedziswa, 1999). For millions of older Africans there is thus no income safety net at all. Destitute persons, and those without kin or kin support, may turn to begging (Togonu-Bickersteth, Akinnawo, Akinyele & Ayeni, 1997).

#### *Family Support Care Structures and Systems*

Non-formal social security systems are therefore the bedrock of support and care in old age in Africa. But, given the forces, the effectiveness of these systems is being compromised. Children may feel less obligated in modern times, or be unable in a harsh economic climate to support elderly parents. Poorly designed and implemented structural adjustment strategies have damaged the capacity of families and communities to support their elders.

The future capacity of families to support and care for older relatives is therefore the second area I refer to. The hardships of rural ageing, for example, are aggravated by migration of the young to cities in search of jobs. Rural areas have particular infrastructural deficits. Older women, in particular, find it difficult to perform household survival chores - such as fetching water and carrying firewood, tilling lands, and sowing and harvesting crops - in the absence of able-bodied younger kin.

Given the scarcity of resources and low formal service provision, contemporary policy making and planning should therefore recognise the legacy of care and support previously provided by family, when older members were valued and not viewed as a burden. And they should seek to incorporate this legacy in the development of social care programmes for the older population.

#### *Health Care Systems*

The third area selected is health care systems and

their responsiveness, or lack thereof, to older clients. The median age of African populations is 18.4 years (UNPD, 2000); health resources are therefore primarily targeted at children and the youth. Communicable disease is still rampant in Africa particularly the so-called diseases of poverty. The non-communicable disease health care needs of older persons are not viewed as a priority and older persons are marginalised in the formal health system.

African countries have dual health-care systems: (1) A traditional medicine system, particularly in rural areas, as practised by local herbalists, and traditional healers such as faith and spiritual healers, bone setters and birth attendants; and (2) a formal health care system, offered through a three-tier system of primary care clinics, community hospitals and teaching hospitals the latter two tiers though being virtually inaccessible to the majority of older persons. Teaching hospitals, for the very great part, have neither geriatricians nor dedicated geriatric services. In general, very few health professionals have any training in geriatric medicine. (Cf. Wilson, 1998; Duodu, 1998; Darkwa, 1997.)

There is also a general acceptance in Africa that old age equates ill-health, and that illness in old age should simply be ascribed to this stage in the life course and not treated. In addition, older persons tend to be cynical about the capacity of Western medicine to heal their illnesses and are thus reluctant to seek medical attention.

#### *HIV/AIDS Epidemics*

The fourth area selected is the impact of the HIV/AIDS epidemics, specifically the impact on older persons. At an advanced stage of their lives, with impending frailty and loss of kin support, older women, in particular, must assume caregiving responsibilities towards sick and dying adult children and grandchildren, and later as surrogate parents to orphaned grandchildren. Not only are they burdened with the practical care of infected and dying kin; they grievously suffer the emotional pain and trauma of their situation, its demands and their losses. They must carry out new responsibilities in the context of extreme poverty and scarcity, particularly food poverty. The disease puts a severe strain on affected



households, in which family income invariably becomes depleted through treating a sufferer or multiple sufferers whose only prognosis is imminent death. (See Ferreira, Keikelame & Mosaval, 2000; WHO, 2002.)

African governments have been slow to recognise and acknowledge the value, role and contribution of older women in the care management of the epidemics, and have thusfar failed to support them in their care-giving burden, nor to support households affected by AIDS.

The question has been posed: Who will care for the carers when they become very old and frail, have lost their adult children to the epidemic, and are no longer able to care for themselves? (See Mupedziswa, 1997.)

### **Support and Care Systems: The Way Forward**

How then, given the realities, scarcity and situations, may we consider high standards in provision for and the protection of older persons in Africa?

It is evident that the economies of the majority of the countries are extremely dire. Several initiatives are challenging the developed nations to invest in Africa, as a way to eliminate rampant poverty and under-development, and to forgive debts. The enormity of the economic challenges, though, suggests that we focus on more immediate, feasible tasks and strategies.

I have demonstrated the growing constraints on families as sources of support and care, as well as constraints on the provision of social and health services. And I have indicated that older persons have low priority in the allocation of state resources. It is evident that Africa has far fewer and less developed care systems than other regions. And it has more poor and disadvantaged older persons who lack minimum conditions and means for survival, relatively speaking .

But, African countries do not aspire to developed countries' concepts, practices and standards. Cost-benefit ratio arguments in developed countries have far less relevance in Africa. African countries also

resent prescription from the West, and they reject solutions, therapies and modalities modelled in Western countries. Africans must find African solutions to their problems. In general, the developed world lacks understanding of Africa's situations and needs, and discourse may be at cross purposes. Thus, we must develop our own systems of care, and not try to emulate Western systems.

That said, I select a specific area of elder care to demonstrate what might be appropriate local care strategies and solutions: the nascent, or undeveloped area of geriatric care. I draw on a rudimentary model proposed earlier by Adrian Wilson (1998), formerly a geriatrician at the University of Cape Town, South Africa. Wilson argued that a single, established system of care (e.g. the Western geriatric medicine model) should not be imposed on evolving African systems, but that the best principles from developed systems should be critically selected and applied to shape services appropriate to local circumstances. Thus he proposed an evolution of a speciality based on local processes and systems, rather than along a classical, or structural bed-based model. The principles, he argued, should be integrated into models of care which incorporate informal (or family) care and indigenous knowledge systems of disease. A present reliance on informal health care and self-treatment carries a risk that treatable conditions often present at formal health-care facilities only at an advanced stage of the disease (1998: 30).

A second proposal of Wilson's pertains to preventive medicine, through public education, but which has a component that incorporates traditional healers in formal health care, as complementary providers, and encourages them to access medical help when needed through accessible channels (1998: 32).

A third proposal made by Wilson is that African health care planners should focus on processes to develop health care systems, rather than create physical structures (1998: 31). He argues that structures devour capital, are labour-intensive, demand equipment, separate disciplines and skills, and so on; systems do not. Elder care systems should not be hospital-based, where possible, but based in primary and secondary settings. In addition, they



should simultaneously address health, functional, environmental and social concerns of older clients.

Drawing on the views of several authors (Duodu, 1998; Darkwa, 1997; Wilson, 1998) and those of the author, other strategies might be:

- The eradication of discrimination and marginalisation of older clients.
- The education of health professionals to improve their attitudes towards health care for the elderly, and to underpin practice with traditions and notions of respect for elders.
- The effective re-organisation of scarce health resources and the urgent development of age-oriented human capacity.
- Dealing with bed-blocking in acute hospital in-patient services, where older persons are brought to die, are relegated to a lower level of care, and are "never" discharged.
- The creation of geriatric health care systems infrastructure and implementation of services in rural areas.
- The education of family carers to improve effectiveness, and of older persons to promote autonomy through involvement and integration in their own care programmed

In the end, given the scarcity and other factors, older persons in Africa will continue to rely for the greatest part on informal care networks of children, families and communities. Family structures, inter-generational relations and core traditional care values therefore need to be buttressed, to sustain this important and vital source of care and support, which is at risk of erosion.

Thus, what Wilson (1998) and others have proposed, and what is summarised in the conclusions below, might be the best that Africa is able to do at this point to improve standards in geriatric care - as standards are understood in a Western context.

## Conclusions

As far as the improvement of standards (in service provision, health and social care, knowledge generation, applied gerontology, technology development, and so on) in low economies (with commensurate scarcity and consequently a tradition of non-formal care) goes in the case of African countries, it may thus be concluded, and in some cases recommended, that:

- Extreme chronic poverty blights the lives of older Africans. Public services, where they exist, prioritise the young and discriminate against the old.
- Expansion of formal services to the older population, and more sophisticated logistical and technological solutions to problems of ageing are unlikely to occur in the foreseeable future. Efforts should thus be directed to finding, strengthening, developing and relying on appropriate indigenous solutions and strategies.
- African gerontologists and governments as well as NGOs must find ways to slow down family dissolution and to make efforts to strengthen family support and care systems.
- The effectiveness of existing formal and informal support and care systems must be maximised - at every opportunity, and through creative partnerships between governments and community-based agencies, and by increasing the participation of local communities and older persons themselves.
- The political will of African governments to allocate resources to the older population must be forged, and additional, appropriate and improved policy responses elicited firmly.

**The foregoing are some challenges for policy makers and service providers in the context of population ageing, social and other demographic forces, and scarcity in Africa.**



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# TOWARDS HEALTHY AGEING: A Viewpoint from Tanzania.

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*Abstract.*

*Ageing is defined as " Progressive loss of adaptability with the passage of time so that individuals are less and less able to react adequately to the challenge from both external and internal environment". While ageing is an inevitable and irreversible biological process, and reflects the success in the history of public health policies and social economic development. There is a challenge in its implications towards health policy.*

In this paper I attempt to review the current situation of old people in Tanzania with our national health policy of 1990/2002 on aspects of ageing through a discussion to delineate issues related to demographic transformation, disease in a geriatric perspective, changes in traditional values, community perception of old people and their implications towards achieving healthy ageing.

## **Preamble**

Ageing can be defined<sup>1</sup> as " Progressive loss of adaptability with the passage of time so that individuals are less and less able to react adequately to the challenge from both external and internal environment While ageing is an inevitable and irreversible biological process, both the onset and the meaning of old age are culturally constructed. The yardsticks people employ to determine who is old differ from culture to culture. Although Glascock (1980)<sup>2</sup> identified three fundamental criteria for defining the boundaries of old age as chronology, functionality and social attributes, the most commonly chosen age limit has been 60 years, a choice that has its origins in the respective definition of the United Nations and the First World Assembly on Ageing.<sup>3</sup>

The United Nations Statistics on ageing (2002) clearly demonstrate a worldwide increase of the old population. According to WHO (2002) these increases reflect "success in a history of public health policies as well as social and economic

development".<sup>4</sup> However, it presents a challenge to humanity in both health and socio-economic arenas.

In the year 2000 worldwide, the proportion of the old population was 10% and is due to double to 21% in half a century while that of children drops from 30% to 21%.<sup>5</sup> Although the African continent remains relatively young, it must be considered as a potential cause of concern because the largest increase in the number of elderly in the world between 1980 and 2000 occurred in Africa and Asia. The number of Africans 60+ years will increase by a factor of 4.4 from 22.9 million (1980) to 101.9 Million (2025).<sup>11</sup>

For Tanzania the 1988 census found that 4.2% of the Tanzanian population were 65 years and above compared to 4.0% in the TDHS of 1991/92.<sup>9</sup> It has been generally observed that in the urban areas like Dar es Salaam the percentage of the elderly is smaller. The AMMP study of 1997 showed that in Dar es Salaam the percentage of the elderly is 2.4%. This trend holds true for all the towns. The numbers for rural areas in Kilimanjaro and Morogoro are 5.8% and 4.7% respectively.<sup>8</sup>

This demographic transformation is probably more of an issue for the developing world than it is for developed countries. This is because in the developed world like Japan ageing was preceded by affluence; this is contrary to the developing world where ageing is coming before affluence. In this context the developing world still has a lot of socio-



**Table 1: Numbers of Tanzanians above 60 years of age**

	DAR ES SALAAM			KILIMANJARO			MOROGORO		
Age	Total			Total			Total		
Years	No	%	cum.	No	%	cum.	No	%	cum.
60 - 64	622	0.9	98.5	3632	2.6	94.3	3000	3.0	95.5
65 - 69	365	0.6	99.1	2448	1.7	96.0	1626	1.6	97.1
70 - 74	325	0.5	99.6	2338	1.6	97.6	1676	1.7	98.8
75 - 79	130	0.2	99.8	1327	0.9	98.5	664	0.7	99.5
80 - 84	54	0.1	99.9	1000	0.7	99.2	392	0.4	99.9
85 - 89	20	0.0	99.9	408	0.3	99.5	113	0.1	100.0
90+	57	0.1	100.0	671	0.5	100.0	144	0.1	100.0
All ages	65,765	100.0		142,179	100.0		99,721	100.0	

Source: AMMP Study: PGS 76,77 and 78

economic problems to fight pending ageing issues. Although this may be the reason it is being given little attention, it is imperative to mention here that we can no longer afford to keep quiet about our ageing population.

### **Tanzania Health Sector Policy and the Aged**

For the first time in the history of Tanzania, a Health Sector Policy document was produced in 1990. Before this time the health sector was developed within the context of the general National Development Policy, within which the guidelines and recommendations were given on how the health care sector should be developed. Examples of these guidelines/recommendations include those of Pridie 1949, Litmus 1961, TANU Biannual Conference 1972, and the recent Structural Adjustment Plans of the 1980s.<sup>12</sup>

These recommendations have given specific emphasis on the type of hospitals to be built, health centres and their contents, dispensaries and their location. They have also been emphatic on the type of health care professionals to be trained, their numbers, placements, remunerations and even

disposal. Other areas specified in these 'policies' include maternal and child health, family planning, prevention promotion and curative care.<sup>10</sup> Old people do not feature anywhere in the policy. The assumption is that they'll be covered somehow within the general framework. Unfortunately this has not been the case because old people form a homogenous group and in the context of the medical field form a special entity..

In the review of National Health policy 2002, the documents discuss increasing life expectancy through different programmes. In the context of the policy, disability free life expectancy is not mentioned. In my own opinion, all the programmes implemented at earlier life aim to prolong life. The question is how many healthy active years are we adding and not just the number of years added. The 2002 policy acknowledged the change in structure of the population pyramid and sentinel increase reporting in non-communicable diseases. The issue of malnutrition among vulnerable groups including the elderly is also featuring in the policy. In the same line the policy intends to emphasize healthy life style.<sup>10</sup> Indeed this is a starting point as older people require access to information about healthy life style,



the ability to appraise such information and a sense of control over their own future.

Although for the first time old people are featuring in the national health policy, it is not being given the attention it deserves. It is high time that specific measures are dictated to address the prevailing situation such as urgently changing the low expectation of health workers from old patients and providing specific training to health care providers, career and community members to create an old-friendly society. More important is **active** ageing. If no such measures are purposefully taken, old people will continue to suffer silently and we will be adding years to life with much suffering. An inventory of the projects/programmes of the Ministry of Health does not come with an old people targeted project. This means that in terms of policy and operations old people have not been practically considered.

### **Old people form a special age group**

Indeed old people form a special age group, with peculiar health problems and atypical presentations. The skills required to care for old people are not just general, even though no general knowledge in geriatrics is provided during medical/nursing training.

Old age is genetically determined and has a strong environment influence. Genes that promote longevity, including *Sr2*, *daf-2*, *daf-16*, *daf-23*, *age-1* and *elk-1* have been identified; seemingly those promoting early ageing and promote ageing related diseases have been identified. At a later age ( old age) medicine is characterized by non specific presentation, co-morbidity, rapid deterioration and multiple pathology so that treatment of a single disorder is unlikely to cure.<sup>14,15</sup> Geriatricians talk of five giants in the specialty namely Immobility, Incontinence, Instability and falls, Insanity (Confusion) and Iatrogenesis. When seeing an old person they talk of generating a problem list, which might not be the case in young patients.

The custom of accepting disease at old age as " It is just the age" inculcates low expectations among career and health care providers and indeed may lead

to a treatable condition being ignored. The author has been told several times by nurses; " Why don't you discharge that old man, that is just old age". My response to such argument has always been: 'that is how you will be treated in twenty years'. I must also argue by saying: When a child presents with seizures the diagnosis may be febrile fits, epilepsy or meningitis and not "Childhood problems". When an old person has fits we will say "it is just his age". It is important therefore to look beyond the symptoms because any disease in old age may present with falls, incontinence, confusion or immobility.<sup>1</sup>

### **Ageing population and change in social structure.**

Increase in the proportion of old people is happening when traditional social protection systems for the elderly are crumbling in Tanzania and in many other developing countries. Families in Tanzania are in a rapid state of transition, from extended into a nuclear one; this erodes traditional protection systems of the elderly. Urbanisation, globalisation and industrialisation have increased the vulnerability of the elderly. The impact of HIV/AIDS resulting in death of prime adults leaving old people caring for their grand children cannot be ignored. Voiced by old people in Tanzania, they have expressed a serious concern on their ability to care for their grand children because of HIV/AIDS, their limited productivity, limited accessibility to health care, neglect by the government and harassment from children and relatives over property.<sup>6</sup>

The perceptions of the community towards old people have changed over time. Similarly the roles of elders have changed from being advisors to youth to independent life, where they are forced to make money in order to survive or support their grand children. The notion that old people are cared for by their children or grand children seems not to hold any longer. Old people are reported to be living alone or with their spouses (80%) precipitating chronic energy malnutrition that is reported to exceed a prevalence of 26% in Morogoro.<sup>7</sup>

The elderly are especially likely to be adversely affected by the death from AIDS of prime-aged adults. A significant proportion of adults suffering from HIV/AIDS return to their parents' home shortly



before death. The time spent by elderly persons performing household chores rises following an adult's death and their participation in wage employment falls. Evidence revealed that the physical well being of the elderly as measured by Body Mass Index (BMI) is reduced before death of an adult relative but recovers thereafter. These results suggest that interventions to prevent a decline in well being should be focused on the elderly households with an AIDS patient during the period of illness.<sup>16</sup>

### Adding life to years.

Health care expenditure between the ages of 30-39 and 60-69 increases at a factor of 1.75 and almost doubles at the age of 60-69 and 80-89. It is also reported that age specific mortality rate increases with age.<sup>8,13</sup> Evidence however has indicated that it is not old age per se that is responsible for higher health costs associated with increased life expectancy, but bad mental and physical health earlier in life that results in dependency and disabilities of all kinds in old age.<sup>14</sup> In this perspective, intervention to improve health earlier in the course of life together with health promotion would reduce the cost.

Exercise can be defined as planned, structured, repetitive movement done with the express purpose of improving or maintaining physical fitness. Exercise that produces contraction of skeletal muscles and increases energy expended is associated with reduced risk of coronary heart disease, diabetes, cancer of colon and several other chronic diseases.<sup>15</sup>

Although there are no guarantees about healthy life, genetics and life style factors are paramount. Life style factors in later life are crucial influences on health span and disability and are potentially modifiable.<sup>15</sup>

Risk factors are responsible for 70% declining in health at old age. Since these are modifiable, disabilities can be prevented. The table below shows the life expectance (LE) and Disability Free Life expectancy (DFLE) over years. The table shows an increase in life expectancy in about two decades with little increase in disability free life expectancy.

However the increase among women exceeds that of males.

**Table 2.**

### Trends in Life expectancy (LE) and Disability Free Life expectancy (DFLE) from age 65 years.

Year	Men		Women	
	LE	DFLE	LE	DFLE
1976	12.5	7.1	16.6	8.6
1981	13.1	7.9	16.6	8.5
1985	13.4	7.8	17.3	9.2
1988	13.7	7.5	17.6	8.7
1991	14.2	7.9	17.9	9.8

Source: Data from Bebbington A, and Personal communication.

To achieve high disability free life expectancy, we need to embark on "Active ageing". At old age physical activity level declines because of diseases, society expectations, pressure from the family and often voluntarily. Inactivity in old age however, increases the risks of obesity, diabetes, osteoarthritis, heart diseases, osteoporosis, diverticular diseases, constipation, DVT and pulmonary embolism.<sup>14</sup>

Most old people will benefit from life style modification. Such practices include reduction of unsaturated fats, stopping smoking, regulating body weight and exercise. People in 40s to 70s with high risk such as smoking, sedentary and high Body mass Index have earlier onset of disabilities and greater level of cumulative disability as well as more disability in the final year of life than those who were free from the risks.<sup>15</sup>

Although compelling evidence exists on the benefits of exercise at old age, many health professionals lack the skills, knowledge and inclination to routinely counsel older patients about physical activities. Elderly people must be informed that regular physical exercise is both appropriate and desirable and the older community should be involved in developing a range of services and facilities to back up the phenomenon.



The question is, probably, how much exercise is needed. In this regard, past experience is misleading. Exercise benefits old people more than it can harm. Moderate intensity physical activity such as walking, dancing and gardening as short as 7-8 minutes and rising to 30 minutes on most days of the week is beneficial. Those who have long been sedentary should start slowly with a few minutes in a day and build up over days. If activity is not provoking symptoms, it is very unlikely to be causing harm. Evidence shows that regular physical activities in old age can 'rejuvenate' physical capacity by 10-15 years. Further more weight bearing exercise in females may slow the rate of osteoporosis, and regular exercise may help in major depression disorder.<sup>14,15</sup>

### **Challenging cultural expectations.**

There are clearly compelling reasons for old people to be physically active. For this to be achieved, a radical change in community and hospital staff attitudes is required. Well intentioned relatives who take over the household chores may be depriving their elderly relatives of their main physical activities. Too often when an old person is struggling with self care, he/she is simply provided with social support instead of helping him/her to gain the lost skills. Such inappropriate provision of social support may simply accelerate the rate at which disabilities set in.

### **Conclusion:**

Although population ageing is a success story, it is preceding affluence, thus presenting a major

challenge to social economic systems. The health system is rather conspicuous in its lack of specific focus for the aged; this makes old people continue to suffer silently along with disabilities. Unfavourable attitudes and lack of skills for care of old people inculcate low expectations affecting their performance. Active ageing is particularly important in achieving quality health ageing, and should be advocated. A public health approach to an ageing society is long overdue and should explore opportunities and incentives for healthy life styles.

### **Recommendations.**

In view of the above I recommend the following:

- Health department should acknowledge that health care to old people continues to be deficient
- The major purpose should be increasing disability free life expectancy
- Purposeful efforts be made to build urgently a health care cadre with knowledge in gerontology
- On job training in geriatrics and gerontology be made to change urgently the attitudes and improve knowledge and skills in caring for old people/patients.
- Tanzania Public Health Association to spearhead healthy life style and active ageing
- Research be done in ageing community to elucidate the opportunities and incentives for a healthy life style in Tanzanian setting.
- Health promotion education should target old people focusing on healthy life style and moderate exercise to maximise physical fitness and restoring functions.

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## MERCK INSTITUTE FELLOWSHIPS



The International Institute on Ageing, United Nations – Malta has received a grant from the Merck Institute of Ageing and Health, Washington D. C. for the years 2003 and 2004 for Training Programmes, which are held in Malta. These funds support the educational activities of 8 Fellows from developing countries participating in the Short Training Programmes in Social Gerontology, Economic and Financial Aspects of Ageing, Geriatrics and Demographic Aspects of Ageing as well as 2 Diplomates participating in the 9-month Postgraduate Diploma Course in Gerontology and Geriatrics at the European Centre for Gerontology, University of Malta.

Applications for the above Fellowships will be received by Professor Frederick F. Fenech, Director of the International Institute on Ageing, United Nations – Malta, 117, St. Paul Street, Valletta VLT 07, Malta, e-mail [ffen@inia.org.mt](mailto:ffen@inia.org.mt).

The closing date of applications can be obtained from the Institute's website, [www.inia.org.mt](http://www.inia.org.mt).



# THE ELDERLY IN TUNISIA

RADHOUANE GOUIAA

## I Demographic data

In Tunisia, although the population remains relatively young, one expects considerable increase of the old population. Indeed, the fraction of the 60-year old persons and over has increased from 4.1% in 1956 to 8.4% in 1997. As regards the proportion of the 65-year old persons and over, it has increased from 3.5% in 1966 to 5.6% in 1997. Confronted with the increase of the proportion of the 60-year old persons and over, one finds the reduction of the proportion of the less than 15-year old children.

### Evolution of the structure by age of the Tunisian population

AGE (years)	1956	1966	1975	1984	1989	1991	1992	1994
0 - 4	18.3	18.6	16.0	14.6	12.8	12.1	12.2	11.0
5 - 14	24.2	28.0	27.7	25.1	25.1	24.7	24.4	23.8
15 - 59	53.4	48.0	50.4	53.7	54.7	55.5	55.8	56.9
> 60	4.1	5.5	5.9	6.6	7.4	7.6	7.6	8.3

This evolution of the structure by age of the Tunisian population is explained by:

1. The decline of the fertility: This has a considerable influence on the evolution of the pyramid of ages which represents the essential cause of this ageing.
2. The decline of the mortality: Indeed, in our country, the raw rate of mortality showed a considerable decline between 1966 and 1997 going from 15.0 to 5.6 deaths for 1000 inhabitants.
3. The improvement of life expectancy at birth: Life expectancy at birth increased sharply rising from 67.1 years in 1984 to 71.9 years in 1997 and this improvement was slightly better for women than for men (5.6 years of gain versus 4.0 years only for men).

### Evolution of the life expectancy at birth of the Tunisian population

	1984	1989	1992	1994
Men	66.1	67.0	68.9	69.3
Women	68.2	69.7	72.4	73.0
The two sexes	67.1	68.3	70.6	71.1

This evolution of our population will constitute a challenge because of its sanitary, social and economic consequences. Indeed, the ageing is accompanied by appearance of handicaps, that it will be necessary to take care of. It is also accompanied by the increase of the incidence of the pathologies " dependent on age ".



The ageing of the population will entail inevitably an increase of the demand of care, services and institutions adapted to these persons.

## II Socio-Economic Data

### 1. Level of instruction:

In broad outline, 4 persons on 5 among persons older than 65 years have no level of instruction. The level of instruction is lower among women than among men, and lower in rural areas than urban ones.

### 2. Professional activity:

Of the over 65-year-old persons, 13,4% are still active. The majority of active persons are men (that is 90.0 %), they are almost all younger than 80 years (that is 97.3 %) and they live mostly in rural areas (that is 72.9 %) where they continue to work in agriculture.

### 3. The resources:

a. *Main sources of income*: Families represent the main source of income of our old persons living at home. Indeed, more than half are taken care of by the family (56.2 %). It is also the women who benefit most from home help (78.8 % vs. 34.3 % for men,  $p < 0.001$ ).

The proportion of the old persons given care by the family increases regularly and significantly with age; it gets, indeed, from 53.0 % among the less than 70-year-old persons to 67.3 % of those 80-year-old and over.

The proportion of old persons taken care of completely by their families decreases in a regular and significant way with the level of instruction. We notice, indeed, that this proportion reaches 62.0 % of the old persons having no level of instruction against only 22.3 % of those having done primary studies or more ( $p < 0.001$ ).

The second source of income of the old persons is represented by the pensions which concern 17.9 %, and almost exclusively men.

As for professional activity, it is the main source of income for 12.4 % of the old persons and concerns especially the men and the old persons living in rural areas.

Finally, 6.8 % of the old persons enjoy social security. The old persons living alone are more covered by social security than those living in the family (17.1 % vs. 6.1 %,  $p < 0.001$ ).

### Main sources of income for the elderly

SOURCE OF INCOME	Percentage
Professional activity	12.4
Pension	17.9
The family	56.2
Social assistance	6.8
Other sources: rent, settlement	5.6
Undetermined	1.1
<b>TOTAL</b>	100.0



b. *The system of the pensions:* Two big funds form the biggest part of the Tunisian system of welfare. They are the National Fund of Social Security (CNSS) and the National Fund of Pension and Social Foresight (CNRPS). The first is in the service of the private sector. The second covers various services of the employees in office and in the pension of the public sector within the framework of two regimes:

- The compulsory regime which draws its resources from a contribution of 2 % of the salary of the employees in service and from a contribution of 1 % of the pensions chargeable to the pensioners;
- An optional regime (voluntary) is also offered to the civil servants in office or to the pension.

Besides these two big funds, one also finds insurance companies and a large number of insurances - groups managed by companies of private insurances.

Among the pensioners, three persons out of 4 have employee's pension (74.4 %). The pensions of reversions concern about 16 % of the pensioners and the pensions of incapacity 1.8 % only. Finally, 6.2 % of the pensioners are concerned with another shape of pension.

#### 4. Social coverage:

On average, one old person out of 6 has no social coverage and 40.7 % of the population get free medical help.

Finally, it is necessary to note that it is in rural areas that free medical help represents the main mode of social coverage: 48.6 % vs. 33.7 % in urban environment ( $p < 0.001$ ). In contrast, health insurance funds constitute the main shape of social coverage of the old persons living in an urban zone (46.6 % vs. 32.4 %;  $p < 0.001$ ).

#### 5. Conditions of social life:

In the field of interpersonal relations, the important fact is the weak proportion of persons 65-year-old and over living alone: 6.5 % only .

The 65-year-old persons and over living at home are not isolated, they maintain very close links with the various members of this environment and they have rates of very high social contacts.

#### **Domestic way of life of the elderly**

<b>Way of Life</b>	<b>Percentage</b>
Elderly living at home with the spouse	61.0
Elderly living at home with the children	16.8
Elderly living at home with other old persons	0.2
Elderly living with relatives	16.4
Elderly living with kindred or other old persons	2.7
Other way of life	1.6
Undetermined	1.1
<b>TOTAL</b>	100.0



Six old persons out of ten live as couples; the men more often than the women (78.4 % vs. 35.1 %). This would be due to the fact that; after the premature break of a marriage, by death of one of the spouses or by divorce, the men tend more to recover as couples.

The domestic situation of the old persons modifies in a sensitive way with age. Indeed, the proportion of the old persons living in couple decreases in a regular way with this parameter, while that of the persons accommodated by the family increases.

The cohabitation between the various generations remains in our population an important way of life. One notices a strong geographic nearness among the relatives and their children. Indeed, on average 9 old persons out of ten live in the same flat of one of their children or near. This geographic nearness is an element to facilitate exchanges of services among the old persons and their children.

The solidarity between generations is illustrated by the fact that 83.9 % of the old persons receive help from their children. For 6 old persons out of 10, this help is financed and the women are significantly better supported financially than the men. The children also participate in the tasks which provide domestic help.

The domestic structure plays, thus, an original role in the financial and emotional security of the old persons living at home.

It is however, important to mention that this domestic solidarity, the cultural weight of which is unmistakable, is liable to a light reorientation by the conjunction of several factors, among which the impact in time is difficult to measure, namely:

- The fertility decline,
- The elongation of the duration of life,
- The attraction of cities for the young population,
- The development of work for women,
- The progressive passage from the extended family to the nuclear family.

#### 6. Place of residence of the old person:

As we have already said, the greatest majority of the old persons now live at home or at their children's, and are supported by their families which assure them all necessary help.

The current policy of Tunisia has opted for the intensification of the preservation of the old person at home, namely the law N° 91-114 of October 31, 1994, relative to the protection of the old persons, which asserts in its article 2 the responsibility of the family in the protection of the old person and the satisfaction of its needs. The state helps families to carry out their role in this domain. Article 3 foresees that authorities take the necessary measures to facilitate access to the care, to the flat, to the public transports, to the administrative services and integration in the social life.

The decree N° 96-1766 of September 30, 1996 fixed the conditions and the amount of the contribution of the old person or its family to the expense of the social and sanitary services supplied at home.

These services concern the essential needs (hygiene and food) as well as the medical and ancillary medical services at home. The demands are sent to the Regional Direction of Social Affairs which passes them on to the Governor of the Region. It acts for social allowances and stationery of social staff assured either by



public establishments, or private or associative, within the framework of agreements foreseen for that purpose, clarifying notably the amount of expenses. The decree N° 96-1016 of May 27, 1996 fixed the conditions of coverage by the families of the old persons without support.

Only on its demand, an old person without domestic support can be placed in a host family which should satisfy certain conditions fixed by decree. The family can, besides, get material help. Residence in institutions, named by the Tunisian law “establishments of protection”, covers at present only 700 persons in all Tunisia, distributed in 10 establishments, all pertaining to the public sector.

The law of October 31, 1994, stipulates that the appeal for residence in the establishments of protection of the old persons can take place only in case of necessity or in the absence of other solutions, and the old persons can not be accepted or maintained in the establishments of protection without their assent. This same law envisages in its article 9 the creation of private establishments for the protection of the old persons.

### III Health of the Elderly:

An inquiry on the health status of the 65-year-olds and over living at home gave the following observations:

More than half of the elderly are followed and looked after regularly for at least a chronic pathology; 6 % have at least 3 chronic pathologies.

**Number of pathologies regularly followed in old persons**

<b>Number of pathologies</b>	<b>Percentage</b>
No pathology	45.5
one pathology	30.9
two pathologies	17.6
three pathologies or more	6.0
<b>TOTAL</b>	100.0

Three persons out of ten suffer from psychological trouble or lack of sleep: sleeplessness is noticed in 27,6 % of the old persons, and 21 % present a depressive syndrome. About 1 % present an austere mental deterioration. All these states of confusion are significantly more frequent for women. Degenerative osteoarthritis touches 24,5 % of our old persons. In 14 % of the cases, it is an invalidating degenerative osteoarthritis. Hypertension touches 27,6 % of our 65-year-old and over, with a feminine ascendancy. Prevalence of diabetes is 8 %.

Nearly one person out of ten presents with chronic bronchitis. 3,3 % are asthmatic. Digestive pathology is found in almost half, dominated by constipation (25,3 %). Gastro-duodenal ulcers trouble 6 % of this population. Hearing problems are reported in more than one person out of 4. The total loss of sight concerns 2,7 % of the 65-year-old persons and over. 3,3 % of the 65-year-old persons and over are confined to bed or to the armchair.

Concerning the calls for care, one finds that the old persons need as an average 4,3 % consultations per person per year, with 0 consultations for 28 %, and more than 6 consultations for 12 %. The medicinal consumption is on average 1,2 per person, 10 % consume 4 medicines or more.



In conclusion, the health of the old person is characterised by:

- \* The existence of an important poly pathology.
- \* The ascendancy of the cardiovascular, joint, digestive systems and organs of the senses.
- \* The change of the health status touches significantly more the women than the men.

## CONCLUSION:

The demographic evolution of Tunisia goes in the direction of an increase in numbers and in proportion of the old persons. This inevitable evolution imposes a series of measures to prepare for the various needs which are going to ensue from it.

Tunisia has already anticipated:

- 1) By the creation of a legal frame which protects the rights of the old person and assures protection.
- 2) By the introduction of courses of geriatrics in the training programme of the health professionals, and by creating a Department of Geriatrics which began in Sfax in the academic year 95/96 and also in Tunis.

But more needs to be done: indeed, it is imperative to create a network of structures capable of assuring all the needs of the old person in institution, and especially at home: domestic help, care of the sick, medical care, rehabilitation. This will go in parallel with the creation of modern institutions specialized in Geriatrics, seeing that the current tendency of Tunisia is towards the creation of units of geriatrics within services of Internal Medicine.

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*A Society for All ages*

**SAGE** 乐龄

**The 7th International Federation on Ageing (IFA) Global Conference**  
**5-8 September 2004, Singapore**

*Hosted by Singapore Action Group of Elders (SAGE)*

**Conference Theme : “Global Ageing: Sustaining Development”**

In April 2002, there was an unprecedented collective effort by UN member countries and NGOs to address ageing issues. The United Nations 2nd World Assembly on Ageing, First World NGO Forum and the Valencia Forum were held in Madrid and Valencia, Spain. Action plans were drawn up for countries to implement. 2 and a half years later, in 2004, the 7th IFA Global Conference in Singapore will be an ideal platform to share your research findings, programmes and services to advance the cause of seniors with an international audience.





Fig. 2

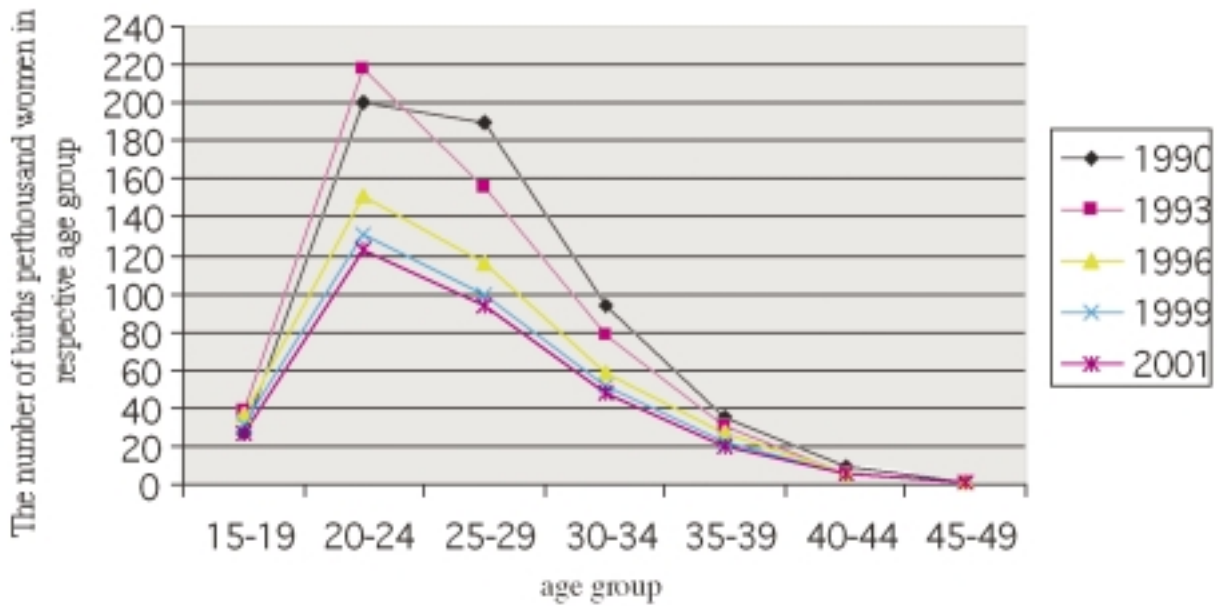


Fig. 2 The dynamics of births by different age groups over the period 1990 - 2001

sheds light upon this process over the mentioned period.

The graph describes the growth rates in the age cohorts {0 - 14}, {15, 19}, {60, ...}.

As is evident from the graph, the growth rate of the population aged 60 and over (1990 = 100%) has considerably exceeded those of the other two age groups over the period 1990-2000. The other striking fact is that the growth rate of the age group {0-14} has been tending to decline beginning from 1994, and has sharply dropped since 1999. One of the most important causes may be assumed to be the decline in birth rates prior to and during the mentioned period. The graph (Fig. 2) reflecting the dynamics of births over the period {1990-2001} confirms the validity of this assumption.

As Figure 2 shows, the birth rates for every fertile age cohort (the number of births per thousand women) has considerably declined over the period under consideration.

Death rates during the explored period exhibit somewhat different characteristics. In Azerbaijan,

the Crude Death Rate (the number of deaths per thousand people) was 6.4 in 1990, 6.8 in 1995, it fell to respectively 6 and 5.6 in years 2000 and 2001. At the same time, progress has been made in reducing the infant mortality. Infant mortality rate (the number of deaths per thousand live births) in the country has dramatically dropped from 23 in 1991 to 12.5 in 2001.

Of course, it is not possible to make an analogical comparison between the decline of birth rates in the country and the identical phenomenon faced by the post-industrial democracies. This is because the drop in birth rates is mostly associated with the social-economic difficulties of the transition period caused by radical structural changes in countries like Azerbaijan. But it does not mean that other positive factors do not play their roles. The analyses show that the average age at which the first child is born has increased from 23 in 1991 to 24.1 in 2000. The increases in this indicator and the first marriage age may be mostly owing to the increasing female involvement in educational programmes and labour force, which is one of the clear signs of higher social-economic development levels in western democracies.



### Forecasts on population ageing in Azerbaijan Republic

In the context of the above arguments, it is possible to argue that Azerbaijan is among those countries, which have already launched on the path of demographic transition experienced by the developed countries in the more or less distant past. Demographic transition involves a country's shift from the demographic situation characterised by high birth and death rates into that demographic state associated with lower birth and death rates. Undoubtedly, over the coming decades, Azerbaijan will experience the process of population aging already challenging the western democracies.

Now, we would like to analyse briefly the results of some of the forecasts we have carried out in this connection. We have worked out some retrospective and perspective calculations relating to the average age of population of Azerbaijan Republic over the period 1995-2020. For this purpose, it is worthwhile to provide some brief information for calculating the average population age.

The concept of average age is a useful tool for determining whether a given population has a younger or older age distribution. When the population age distribution by age groups is available, the average age is calculated by means of the following formula:

$$O = L_0 + (P/2 - \sum F_x) / F_0 * I$$

Where, P- population size;  $L_0$ - the lower boundary of the age group containing the P/2-th individual,  $\sum F_x$  – the sum of all the population segments in all the age groups coming before the age group containing P/2-th individual,  $F_0$ - population size in the age group that contains the P/2-th individual, I- the length of the age group containing P/2-th individual.

The following table describes the average age of Azerbaijan's population over the period {1995 - 2000}.

According to our calculations, the average population age in the country will exhibit a remarkable growth tendency over the coming 20 years. Taking 2000 as a base year, this indicator would surpass its base year counterpart by 5% in 2005, 11% in 2010, 18% in 2015, and 25% in 2020. In other words, Azerbaijan Republic, having a young population structure in comparison with both Eastern and Western European countries, in the next decades will experience the same problems of population ageing process already faced by these developed or developing countries. Far-reaching reforms will be needed in order to solve the accompanying social-economic problems. While analysing the driving factors for this process, a conclusion is reached that the life expectancy increase resulting from the future social-economic development will be one of forces contributing to this process. According to our forecasts, life expectancy in the country will reach

**The Dynamics of average population age in Azerbaijan Republic**

	L0	P/2	SUM Fx	F0	I	Average age
1995	25	3863,1	3835	671,8	5	25,20914
1996	25	3899,9	3830,7	670	5	25,51642
1997	25	3938,85	3853,5	676,6	5	25,63073
1998	25	3974,65	3934,7	628,8	5	25,31767
1999	25	4008,1	3923,9	622,7	5	25,67609
2000	25	4040,5	3907,7	610,5	5	26,08763
2005	25	4214,788	3895,313	662,9165	5	27,40962
2010	25	4424,596	3797,321	778,066	5	29,03099
2015	30	4655,195	4539,733	656,8465	5	30,87892
2020	30	4883,095	4385,313	898,7325	5	32,76935



72.87 years in 2010, 74.21 years in 2015, and 75.52 years in 2020. As a result of these increases and other contributing factors, the proportion of those over 65 in the whole population is expected to increase from 6.9 percent to 8.2 percent in 2020. Furthermore, taking into account the growing involvement of women in the social-economic activities, the decreasing birth rate will translate itself into a remarkable decline in the proportion of children under 15 in overall population size (29,4% in 2000, 26% in 2005, 23,7% in 2010, 23,1% in 2015, 22,9% in 2020).

### **Conclusion**

Thus, the factors driving the process of population ageing in Azerbaijan Republic are already set in motion. As a result, a huge generation of pensioners may impose a considerable financial burden on the social protection system of Azerbaijan Republic during the coming decades. In society, the pensioners' numbers and the mean life where it is growing will cause pension expenditures by all means to increase, even irrespective of inflation. The balanced growth of the elderly population will cause the growth of cost of medical and other social services.

Taking into account all these realities, the government of Azerbaijan contemplates the implementation of relevant policy measures. For example, country Houses of Parliament according to norms of international law will provide legitimate acts regulating problems of the elderly. In the social protection legislature, the minimum social insurance contribution period for being eligible to draw a labour pension will be enhanced from 20 years to 25 years for women (equaling that of men) over the 2002-2012 period. On the other hand, an individual account system is expected to be applied in the

country which will make it possible to establish a transparent positive connection between pensions and the social insurance contributions paid over the whole working period.

President's decree of 9 December 1999 "The Conception of Demographic Development of Azerbaijan Republic" is approved, and in it are reflected questions of the ageing population. One of the main elements of the new strategy of the Government is the strengthening of measures in the fight against poverty with the help of attention strengthening of social protection. This is concerned, first of all, with aged persons. In this context realisation of pension reform is included, the basic aspect of which is defined in sustainable development of social protection of this section of the population.

International institutions, such as United Nations Development Programme (UNDP), World Bank, International Monetary Fund (IMF), United Nations Senior Committee on refugees, International Health Organization (IHO), International Migration Organization (IMO), and others, take an active part jointly with Azerbaijan in solution of problems of aged persons in Azerbaijan Republic. With their assistance, several projects, connected with problems of aged persons have been created and all functioning. This cooperation forms an efficient mechanism for realisation of efforts and provision of integrated approaches for development of social policy in relation to aged persons in our country. It is necessary to mention that the "International Year of aged persons" campaign conducted in 1999 under UN leadership gave a fresh impulse to development of State policy for realisation of elderly people's rights.

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### **References**

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2. Nutwell, C. 1998. Methods and Models in Demography. Belhaven Press, London.

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## Short Training Programmes for Chinese Delegates in collaboration with Beijing Civil Affairs Bureau (BCAB) & Zhejiang Working Committee on Ageing (ZWCA)



The International Institute on Ageing, United Nations, Malta in collaboration with the Beijing Civil Affairs Bureau (BCAB) organised a **Short Training Programme in Social, Economic and Health Aspects of Ageing**. The programme, which was attended by twenty-four Chinese participants from the Beijing Civil Affairs Bureau (BCAB) was held at the Forum Hotel between 17 - 27 November 2003.

Another programme for Chinese Delegates, was organised in collaboration with the **Zhejiang Working Committee on Ageing (ZWCA)**. The **Short Training Programme in Gerontology**, which was attended by fourteen Chinese participants from the Zhejiang Working Committee on Ageing (ZWCA), was held at the Forum Hotel, St. Andrews between 4 - 15 January 2004.

Both programmes were opened by the Hon. Dr. Francis Agius, Parliamentary Secretary at the Ministry for Social Policy, in the presence of H.E. Mr. Liu Zheng Xiu, Ambassador of the People's Republic of China, Professor Frederick F. Fenech, INIA's Director and Professor Joseph Troisi, INIA's Deputy Director and programme co-ordinator.

The training programmes addressed a wide spectrum of Social, Economic and Health issues on Ageing. They also included site-visits to local Government and Private residential facilities for older people. Besides, both groups from CNCA and ZWCA paid a courtesy visit to the President of Malta, His Excellency Professor Guido de Marco.



**International Short Training Programme in Demographic Aspects of  
Population Ageing and its Implications for Socio-Economic  
Development, Policies and Plans.  
9 - 20 September 2003**



The International Institute on Ageing, in collaboration with UNFPA and the University of Malta, for the 8th consecutive year organised an International Short Training Programme in Demographic Aspects of Population Ageing and its Implications for Socio-Economic Development, Policies and Plans. The programme was held between 9 - 20 September 2003.

The programme, designed by an International Expert Group and co-ordinated by Dr. Julian Mamo is geared towards: achieving a working knowledge of demographic concepts and techniques; acquiring the methodological approaches, tools and techniques in demography adopted in assessing the conditions of the elderly at global, regional and country level; gaining an ability to convey information effectively to policy makers. This intensive two-week programme included lectures and hands-on computer sessions. Besides, the participants presented a final report at the end of the two week programme.

Apart from local experts, lecturing on the programme were Dr. Nikolai Botev, Demographer from the UN Economic Commission for Europe in Geneva, Professor Du Peng from the Institute of Population AGEing at the Renmin University of China in Beijing, and Dr. Kevin Kinsella, Special Assistant at the Bureau of the Census, Washington, USA.

Fifteen participants hailing from Armenia, Belarus, China, India, Kazakhstan, Kyrgyzstan, Latvia, Nepal, Philippines, Poland, Romania, Russia, Tajikistan and Ukraine participated, with Kazakhstan, Kyrgyzstan and Tajikistan participating for the first time in an INIA International training programme.

INIA received 73 applications from potential participants seeking fellowships to attend the programme in Demography. Nine participants were granted an INIA partial scholarship; one was granted an INIA full scholarship; three participants were fully sponsored by UNFPA, while two participants were granted an MIAH scholarship from the Merck Institute of Ageing and Health, Washington D. C.







# INIA'S ACTIVITIES 2004



5th – 14th January	Short Training Programme in <b>Gerontology</b> in collaboration with the Zhejiang Working Committee on Ageing (ZWCA), (Malta).
19th – 30th January	In-Situ Training Programme in <b>Gerontology and Geriatrics</b> in collaboration with the Heritage Hospital, Hyderabad (INDIA).
9th – 20th February	International Short Training Programme in <b>Social Gerontology</b> , (MALTA).
1st – 12th March	International Short Training Programme in <b>Economic and Financial Aspects of Ageing</b> , (MALTA).
April	In-Situ Training Programme in <b>Gerontology and Geriatrics</b> in collaboration with Ain Shams University, (EGYPT).
22nd – 30th April	In-Situ Training Programme in <b>Gerontology</b> in collaboration with Zhejiang Working Committee on Ageing, Hangzhou, (CHINA).
10th – 21st May	International Short Training Programme in <b>Geriatrics</b> , (MALTA).
19th – 30th July	In-Situ Training Programme in <b>Gerontology and Geriatrics</b> in collaboration with The St. Petersburg School of Public Health, St. Petersburg (RUSSIA).
6th – 17th September	International Short Training Programme in <b>Demographic Aspects of Population Ageing and its Implications for Socio-Economic, Policies and Plans</b> , (MALTA).
13th – 24th September	In-Situ Training Programme in <b>Gerontology</b> in collaboration with the Ministry of Labour and Social Protection, (BELARUS)
October	In-Situ Training Programme in <b>Gerontology</b> in collaboration with the Beijing Civil Affairs Bureau (BCAB), Beijing, (CHINA)
Oct. 2004 – June 2005	International <b>Post Graduate Diploma in Gerontology and Geriatrics (Dip.Ger)</b> European Centre of Gerontology and Geriatrics, (University of Malta), (MALTA).
13th – 16th October	Conference on “ <b>Medicines Management in Older Persons</b> ” organised by the International Institute on Ageing-United Nations, (Malta), in association with the University of Malta – Department of Pharmacy, Zammit Clapp Hospital for the Aged, Parliamentary Secretariat for the Care of the Elderly – Ministry of Social Policy and the European Society of Clinical Pharmacy, SIG Geriatrics, (MALTA)
28th Nov – 10th Dec	In-Situ Training Programme in <b>Gerontology</b> in collaboration with the Singapore Action Group of Elders (SAGE), (SINGAPORE).



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# INTERNATIONAL DIARY 2004

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FEBRUARY 9 - 13  
PRAGUE, CZECH REPUBLIC  
EURAG Seminar on Memory Training for  
Seniors  
Information/Co-ordinator:  
Dana Steinova  
E-mail: danastein@volny.c2

FEBRUARY 23 - 26 – PARIS, FRANCE  
Seminar: Institut National Demographique  
“Age - Structural Transitions”.  
Information:  
Web: <http://www.acred.org>.

APRIL 23 - 24 –PORI, FINLAND  
European Conference on Care for the Elderly.  
“Towards Active Old Age”  
Information:  
E-mail: kari.sirrka@samk.fi.

JUNE 6 - 9 – VIENNA, AUSTRIA  
World Conference on Injury Prevention and  
Safety.  
Information:  
E-mail: [safety/2004@sickerleben.at](mailto:safety/2004@sickerleben.at)

AUGUST 3 - 7 – LONDON, ONTARIO, CANADA  
World Congress on Ageing and Physical activity  
“Research to Action for an Ageing Society”  
Information:  
<http://www.ca/actage/wcapa/en/program-objectives.htm>

OCTOBER 15 - 17 – KYOTO, JAPAN  
International Conference on Alzheimer Disease  
“Dementia Care in an Ageing Society”  
Information:  
Website: [www.alzheimer.or.jp](http://www.alzheimer.or.jp).

### **The Editor Invites:**

All readers and users of BOLD to send him critical comments and suggestions.

### **The Editor Appeals:**

We need regular inflow of your best, most colourful and significant photographs relevant to our Ageing themes to feature on the front cover of future issues of BOLD.

### **Copy Deadline:**

The next issue of BOLD will be published in May 2004  
for which copy deadline is 31 March 2004.

Proposals for articles or letters, information, news bulletins and conference details  
may be addressed to:

**The Editor, International Institute on Ageing,  
United Nations – Malta,  
117, St. Paul's Street, Valletta VLT 07 , Malta**

