



International Association for the  
Study of Insurance Economics

# Études et Dossiers

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## **Etudes et Dossiers No. 320**

**4th Geneva Association Health and Ageing  
Conference on**

**“Chronic Conditions and Insurance”**  
Vienna, 6 – 7 November 2006

**&**

**4<sup>th</sup> Congress of the European Union  
Geriatric Medicine Society**

**Special session on  
“The Financing of the Longevity Risks”**  
Geneva, 24 August 2006

December 2006

## **Working Paper Series of The Geneva Association**

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Layout & Distribution: Valéria Kozakova

# Financing Long Term Care (LTC) for an Ageing Population

J. François Outreville

## Setting the Scene

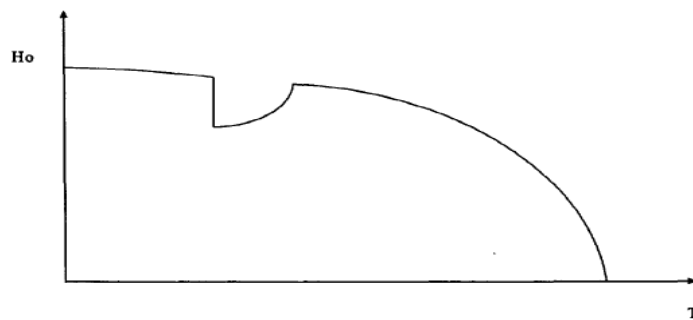
*Definition of Long Term Care (LTC)*  
*Ageing and the risk of needing LTC*  
*How LTC is financed?*  
*The increasing demand for LTC*  
*The future of health care plans*

## The demand for health

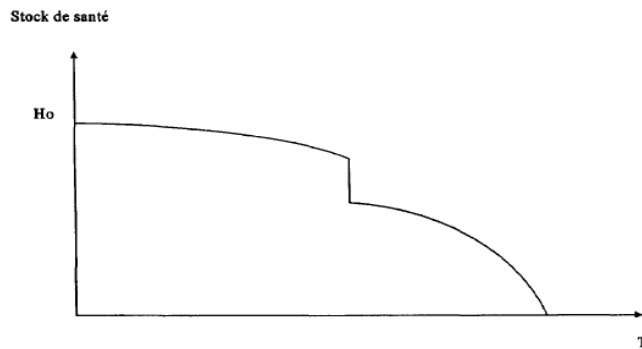
- Demand for health care is derived from demand for health (Grossman model)
- Insurable risks are not homogeneous

## Health Insurance and acute care

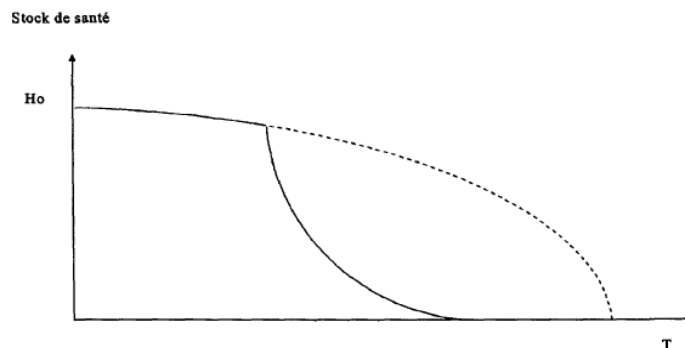
Stock de santé



## Health insurance and the disability risk



## Health insurance and terminal illness



## Definition of Long Term Care (LTC)

- **Long term care (LTC) is the care and/or the assistance that people need when they are no longer able to fully function on their own**
- **ADLs** (bathing, dressing, eating, and other personal care)
- **IADLs** (preparing meals, shopping, money management,...)

## Setting the Scene

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## Ageing of the population

- *“The first and primary cause of this crisis is once again the ageing of the population...”*  
(Longman, 1987)

## Setting the scene: demographics (1)

When Bismarck devised the social security contract for Germany, the official pension age was 65 and life expectancy 45.

Keeping the same ratio, retirement age today should be at 98.

Old age estimated to be at 75 years in 1985, will be 82 years by 2040: an annual gain of 1.5 months

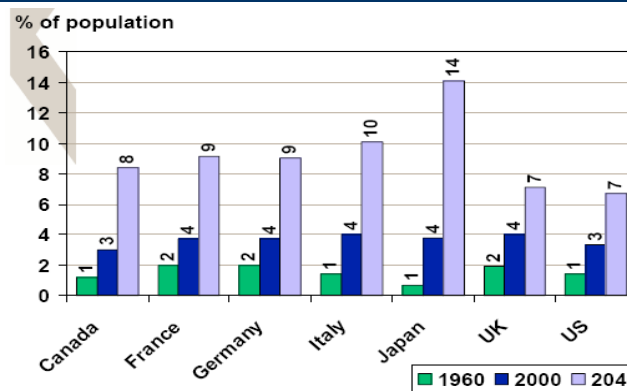
## Setting the scene: demographics (2)

By 2030,  
almost 30% of the population will be > 60 years old

Life expectancy at age 65

in 1995	15.5 years
in 2020	17.6 years
in 2030	18.5 years

## Rising share of elderly population (+80 old)



Source: OECD Health data (2004)

## The risk of needing LTC

- All of us are at risk. Most of us will need LTC. 20% will need assistance for 5 years or more.
- Future LTC needs depend on the interaction of medical, social and technological factors

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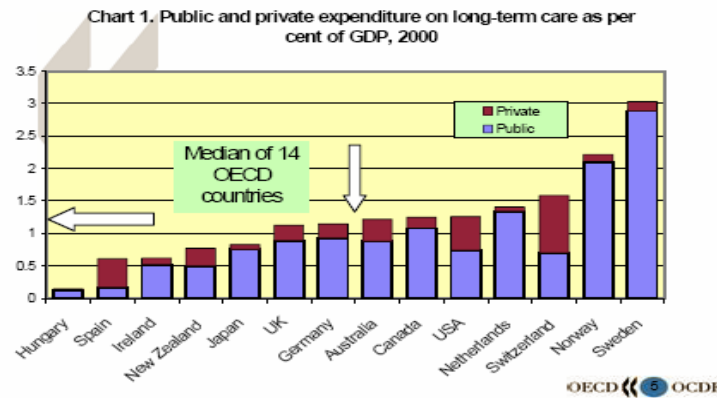
## How LTC is financed?

- Informal care and out-of-pocket expenditure play an important role compared with acute health care
- Number of countries with universal public schemes to cover LTC is growing (Austria, Germany, Japan, Luxembourg, Netherlands)
- Some countries provide universal coverage through public services (Norway, Sweden)

## How LTC is financed? (The US case)

- **US expenditures on nursing home and home health care by source of funds (1995)**
- Out of pocket 32.5%
- Medicare 17.8%
- Medicaid 37.8%
- Private insurance 5.5%
- Other funds 6.4%

## How LTC is financed? (International comparison)



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## The demand for long term care

OECD: LTC expenditures projected to grow to 1.5% of GDP by 2050

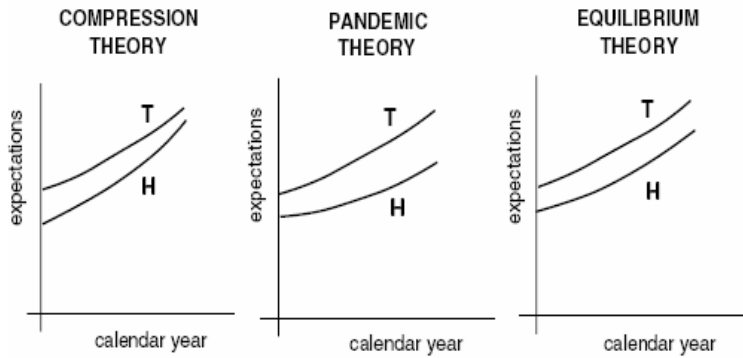
US: LTC expenditures will grow by 2.6% annually between 2000 and 2040

## The demand for LTC

*The longevity risk arises from uncertainty in future mortality and disability trends*

### Mortality and disability scenarios

T= Total expected life  
H= Healthy expected life



Source: E. Pitacco (2002)

### The demand for LTC

	Stable population	Ageing population
Compression theory	Demand decrease	Demand stable
Equilibrium	Demand stable	Demand increase
Pandemic	Demand increase	Demand increase

## Negative factors

- Medical expenditure per treatment episode increases with age.
- Trends in medical expenditure are influenced by trends in disability and product innovation.
- Product innovation focus on increasing quality of life at higher ages.
- The traditional family structure continue to change

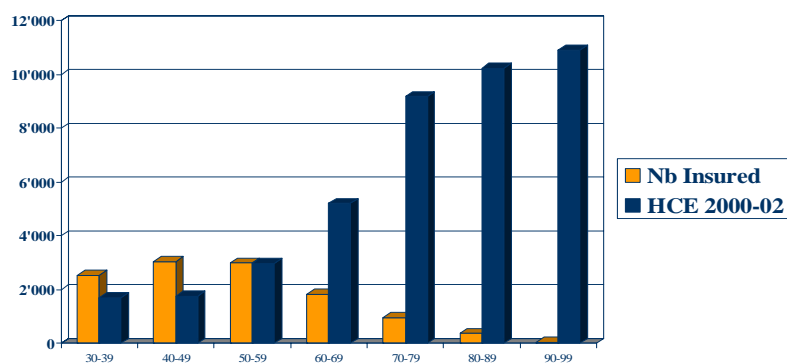
## Improving trends

- Declines in disability rates (-1% per year) even at older age (85+).
- IADLs are easier to perform today than 20 years ago.
- Product innovation may change the trends

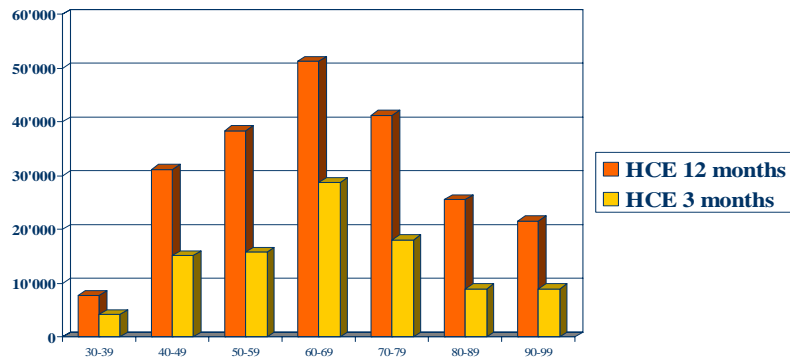
## Health Care Expenditure: A Case Study

- Claims records for 12500 >30 years old
- Outreville (2004), Seshamani & Gray (2003)
- Medical expenditure increases with age.
- Acute care expenditure increases sharply with closeness to death regardless of age.
- Acute care expenditure before death decreases with age
- LTC expenditure before death increases with age

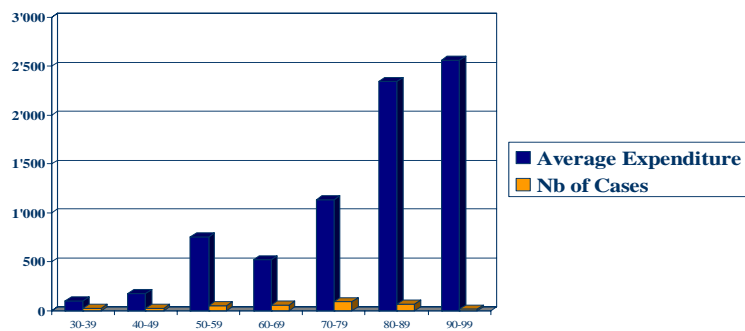
## Global health care expenditure



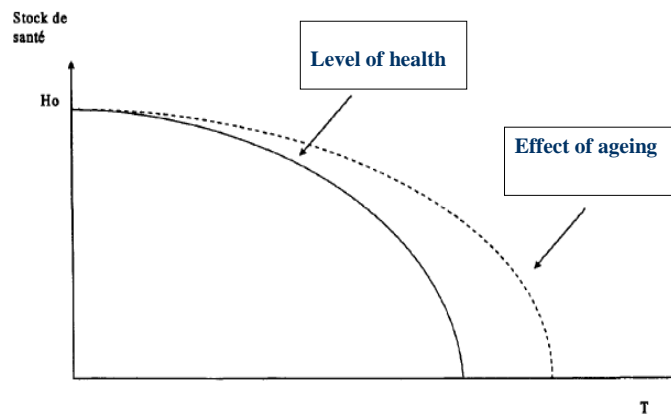
### End of Life HCE



### Nursing and Long-Term Care



## Ageing of the population and health care demand



## Setting the Scene

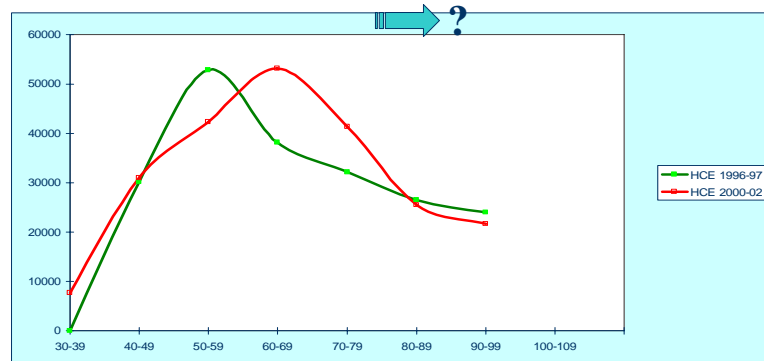
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## Ageing and the future of healthcare plans

- **Sustainability**
  - Individuals are living longer in good health
- **Equity**
  - Health Care or Good Health
  - Health Care or Long Term Care
- **Policy Implications**

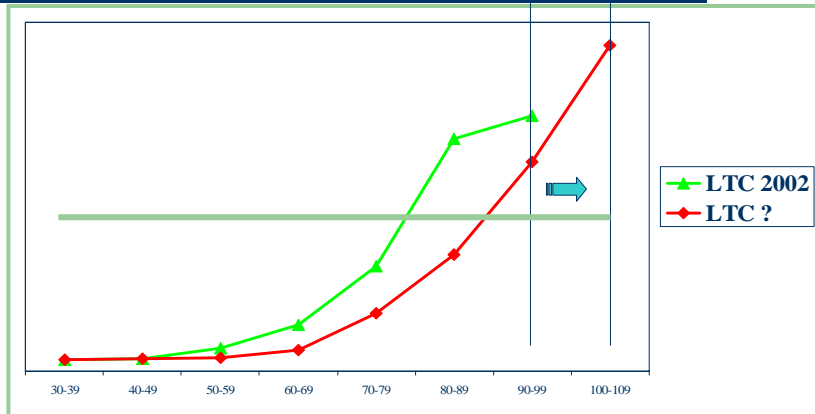
## SUSTAINABILITY

### END OF LIFE HEALTH CARE EXPENDITURE



## SUSTAINABILITY

### NURSING AND LONG TERM CARE



## EQUITY

- **Demand:** LTC remains one of life's largest contingencies for which there is insufficient demand and inadequate amount of risk pooling.
- **Supply:** Many observers have suggested that private insurance would play a major role in financing LTC **only if** it is widely spread ( an employer-based group benefit sold to younger people) and there is comprehensive data available.

## POLICY IMPLICATIONS

- Policy makers now face 3 significant questions:
  - 1) Who should pay for LTC? How should LTC be financed?
  - 2) How should services be designed and delivered?
  - 3) How can the labor force be prepared?
- Public/private mix
- Tax incentives

## Private Insurance considerations

- Elective or compulsory coverage
- Conditions (ADLs or IADLs)
- Daily allowance or reimbursement rate
- Maximum daily benefits
- Lifetime or maximum length of coverage
- Add-on to social insurance

## Financing Long Term Care (LTC) for an Ageing Population

- *“As people are living longer, the hope is that they will also live healthily.”*