Country Report Italy
Main Updates
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1. Population statistics (ISTAT)

1a. Population mortality

Survival curves $l_x$ (males)
Curves of deaths $d_x$ (males)
Mortality profiles (males)
Summary statistics (males)
Life expectancy (period), census 2011

- At the birth
  - males: 79.4
  - females: 84.5

- At 65
  - males: 18.4
  - females: 21.5
Curves of deaths over 65 (males)
Survival curves $l_x$ (2011; females - males)
One-year prob. of death $q_x$ (2011; females - males)
1b. Other population statistics

Population size

![Graph showing population size over time](image-url)
Population structure by age (2015)
Population dynamics
Frequency of ISTAT population statistics

2012: shift from 10-year census statistics to “continuous-census” system: data are collected from local institutions (viz municipalities) on a one-year basis (validation procedures required)
1c. Mortality projections

Most recent projection: 2012
Mortality projection based on Lee-Carter
Mortality projections in the framework of population projections

Three demographic scenarios defined:
• unchanged current demographic scenario, extrapolation of recent mortality trend ⇒ central estimate
• various assumptions concerning immigration, fertility, etc. ⇒ high and low estimates
Life expectancy at 65 (males)
2. Pensioners’ mortality (ONA)

Mortality of Italian pensioners and annuitants analyzed by a Working Group coordinated by Ordine Nazionale degli Attuari (the Italian actuarial professional body)

Observation period: 1980 – 2009

Mortality projections to 2040 have been published

- **Reference population:**
  - almost 10 millions pensioners (in 2009), belonging to various pension plans, managed by public and private institutions
  - corresponding to approx 142 billions Euro of annual benefits

- **Projection methods adopted:**
  - stochastic methods: Lee-Carter model, log-bilinerar Poisson model, Renshaw-Haberman model with cohort effect
  - deterministic method: the APC (Age-Period-Cohort) model, proposed by the Continuous Mortality Investigation Bureau in UK
• Ultimate aim: construction of projected mortality tables, separately referring to various “categories”, and in particular:
  
  – pensioners of the private sector
  – pensioners of the public sector
  – self-employed, split into professional categories (lawyers, doctors, etc.)

Source (English text):

http://www.ordineattuari.it/media/6565/Rapporto%20percettori%20finale%20incl%20allegati%20inglese_580.pdf
One-year prob. of death $q_x$ (males - females)
One-year prob. of death $q_x$ (males - females)
Life expectancy at 65, males
Life expectancy at 65, females
Projected life expectancy at 65, males
Projected life expectancy at 65, females
3. Annuitants’ mortality (ANIA)

Construction of biometric bases for life annuities (2014)

- Tables A1900-2020
  - two-dimension tables; M, F
  - derived from ISTAT 2011 projections, adjusted via self-selection coefficients (derived from CMI statistics)

- Tables A62
  - one-dimension tables, extracted from Tables A1900-2020: cohort 1962; M, F
  - age-shift method for other cohorts
  - different self-selection coefficients
    - A62I: immediate life annuities
    - A62D: deferred life annuities
    - A62C: group life annuities
  - unisex tables, according to various gender mix assumptions