Health Status, Public Health, and the Health Care of Old People

Addressing the Needs of an Aging Population in Sri Lanka World Bank Workshop, Colombo

September 9, 2008

Ravi P. Rannan-Eliya
Institute for Health Policy



Global Evidence



There's bad . . . and good news

Ageing will lead to:

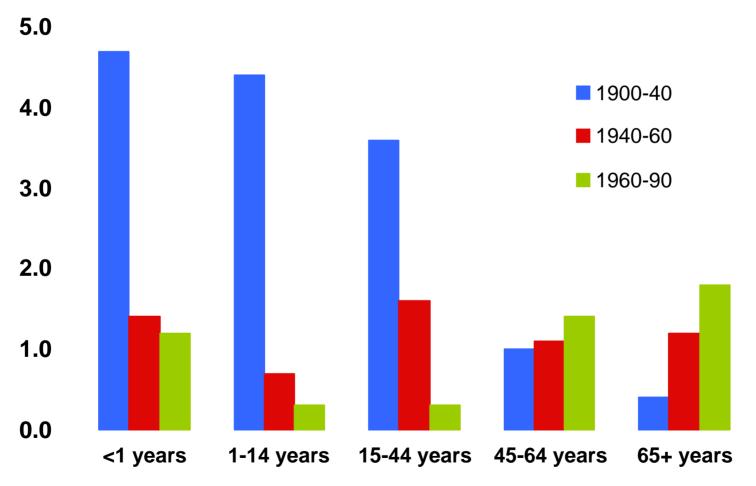
- Shift in health care demands to those of older people (NCDs, chronic illnesses, disability)
- Increase in frail, dependent elderly needing long-term care

But good news:

- Health of older people improving in richer countries
 - Most health gains in older adults
 - Disability rates in elderly declining (1-2% a year)
 - Ill-health being pushed back to final years of life (morbidity compression)
 - More years spent in good health
- Ageing not proving to be the dominant factor increasing health care costs



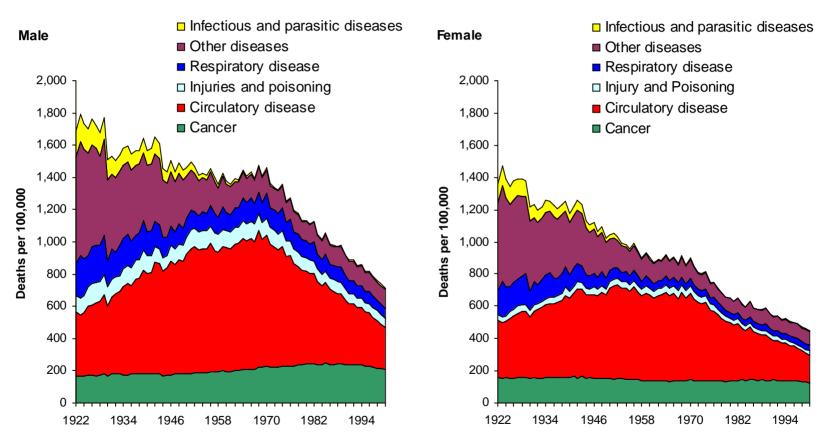
Gains in longevity shifting from mothers and children to older adults



Increases in life expectancy (years) by age group, USA 1900-1990



Decline in death and disability in rich countries since 1970s due to NCDs, led by heart disease

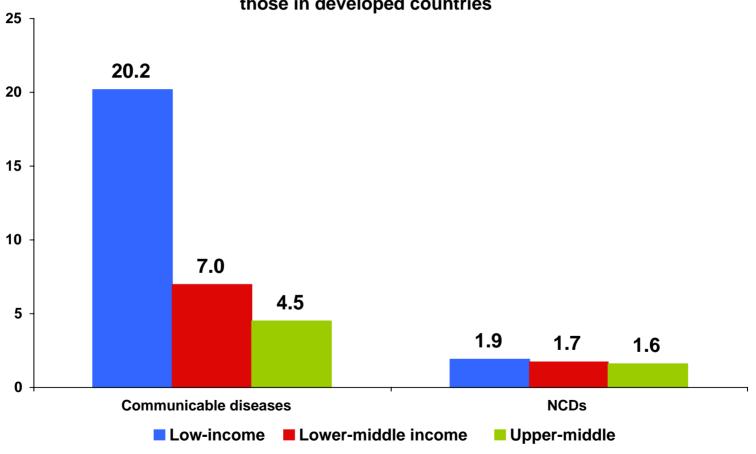


Changes in age standardized mortality rates by disease group, Australia 1922-2000 *Source:* John Goss, AIHW 2006)



NCD rates increasingly higher in poor countries than rich ones

Ratio of age-standardized death rates in developing countries to those in developed countries



Source: Adeyi et al. (2007)



Medical treatment driving older adult health gains, more than prevention

- Evidence best for ischaemic heart disease (IHD)
- Epidemiological models indicate that medical therapies account for half of all reductions in heart disease deaths in rich countries, with rest due to control of risk factors, primarily smoking
- Econometric analyses suggesting a higher role for therapies in USA (65%)
- Recently, link shown between NCDs/treatment and disability/frailty



But very little evidence on what is happening or might happen in developing countries . . . including Sri Lanka



IHP research response 2005-2007

Ravi P. Rannan-Eliya, Reggie Perera, Tharanga Fernando Indralal de Silva, ATPL Abeykoon

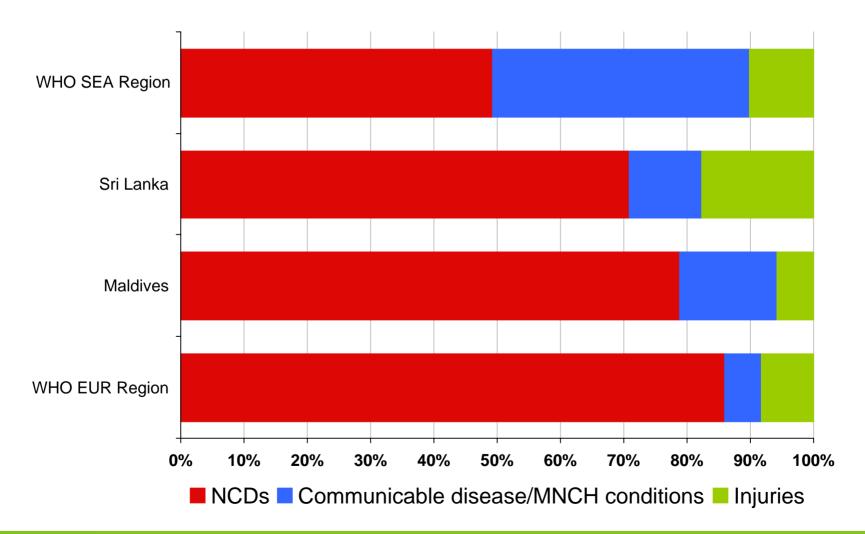
- Demographic projections 2001-2101
- Analysis of disability trends using Census data, 1981-2001
- Analysis of mortality trends using Registrar-General data, 1990-2001
- Modeling future health expenditure
- Case study of IHD
- Global and national literature reviews of impact of aging on health and NCDs



Sri Lanka Finding 1 - Increasing NCD burden with ageing

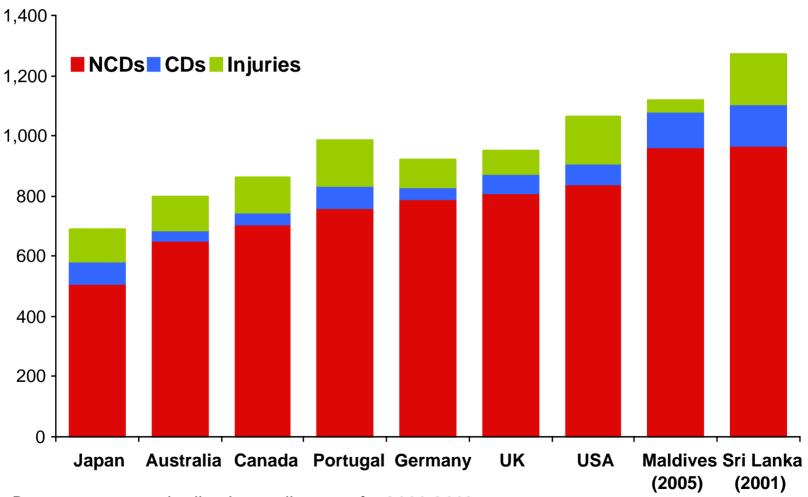


Non-communicable disease already dominates disease burden





Mortality rates for NCDs in Sri Lanka already higher than OECD countries



Data are age-standardized mortality rates for 2000-2002



Current NCD trends in Sri Lanka

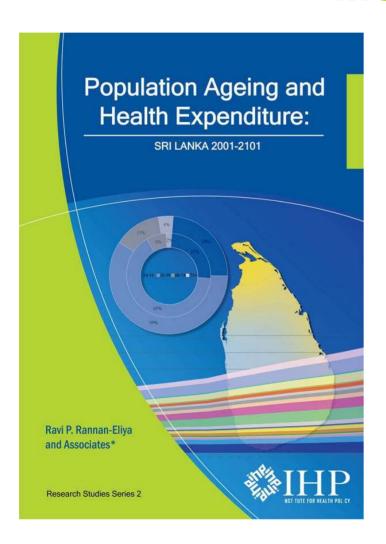
- Increasing ill-health from NCDs
 - Account for 71% of all deaths
 - Ischaemic heart disease (IHD) is number 1
- Differences with European nations
 - Heart disease rates higher, but increasing
 - Diabetes comparable, but increasing
 - Cancers lower
- Risk factors
 - Smoking and hypertension low
 - Hyperlipidaemia high
 - Poor foetal undernutrition/epigenetic effects



Sri Lanka Finding 2 - Ageing will not be main driver of future healthcare costs



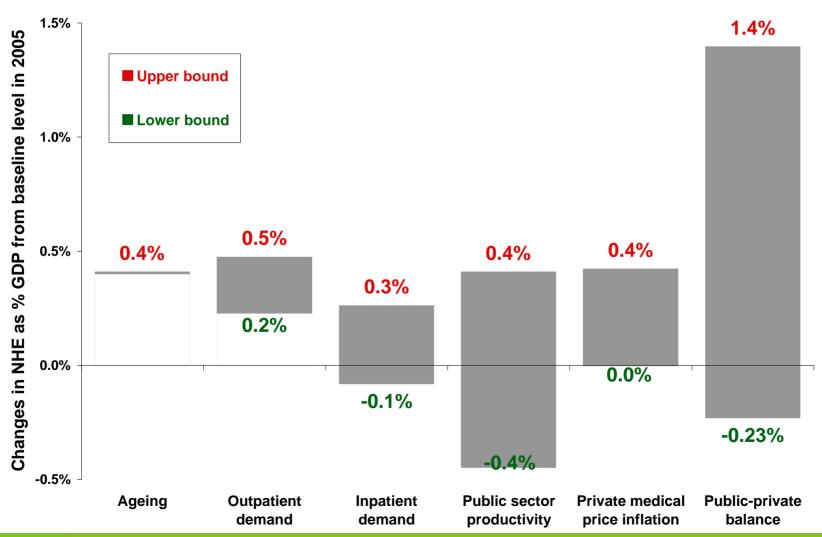
IHP Health Expenditure Projection Model



- Actuarial cost projection model
- Based on international best practice, and models used by USA, UK, OECD, etc
- Parameters:
 - age and sex structure, public sector productivity, private sector price inflation, changes in healthcare use, involvement of public sector
- Time horizon
 - 2005-2101
- Scenarios
 - (1) Status quo, (2) Public sector strengthening, (3)
 Private sector reliance



Impact of key cost drivers on national spending by 2025 (% GDP)

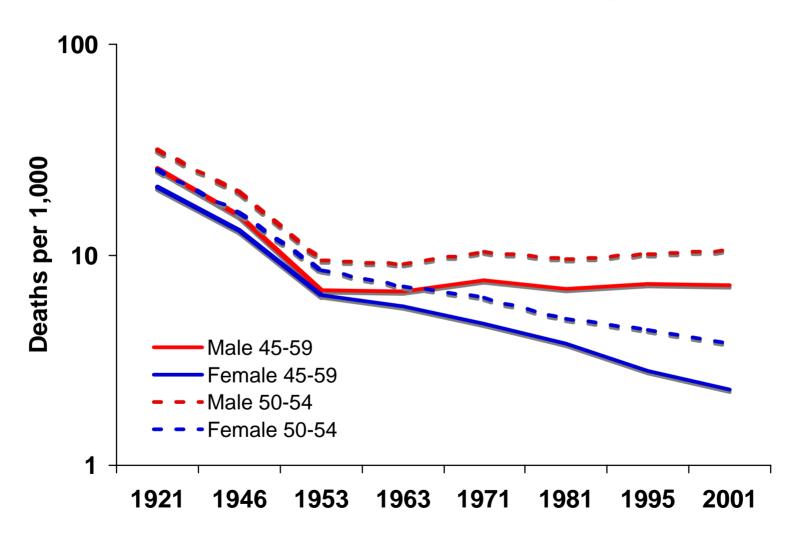




Sri Lanka Finding 3 – No evidence of improving older adult health (morbidity compression)

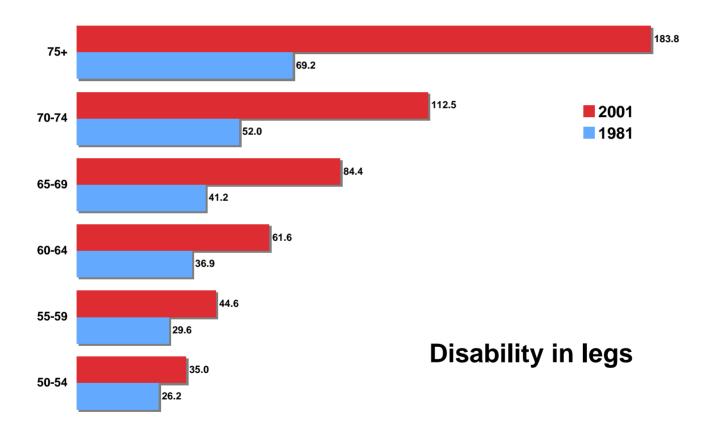


Life expectancy not improving in older men since 1970s





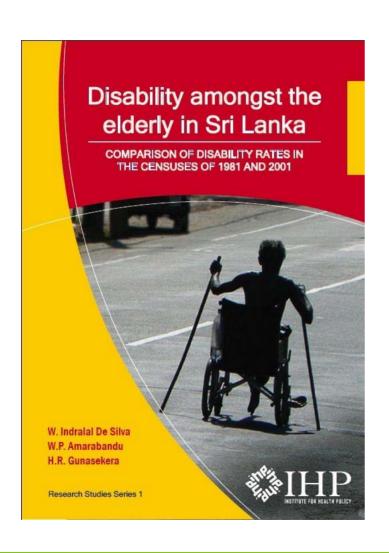
Census data show disability is increasing in elderly, 1980-2001



Analysis of Census 1981 and 2001 Census data by De Silva and colleagues (2008)



For more information



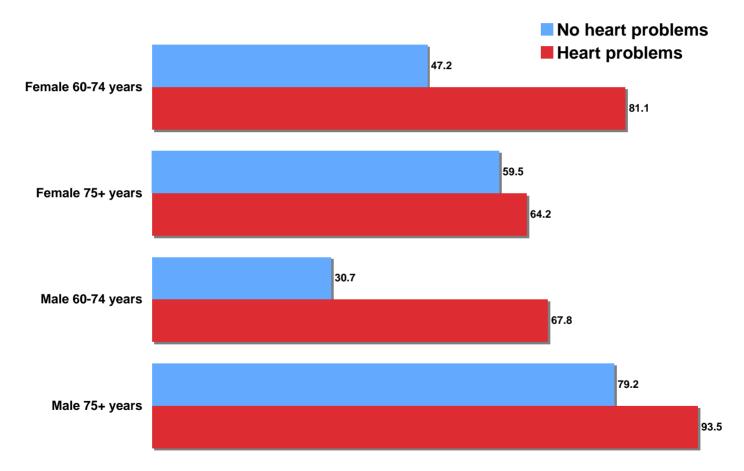
Disability amongst the elderly in Sri Lanka:

Comparison of disability rates in the Censuses of 1981 and 2001

De Silva, Amarabandu and Gunasekera (2008)

IHP Research Studies Series 1

Increases in NCDs and older disability may be linked



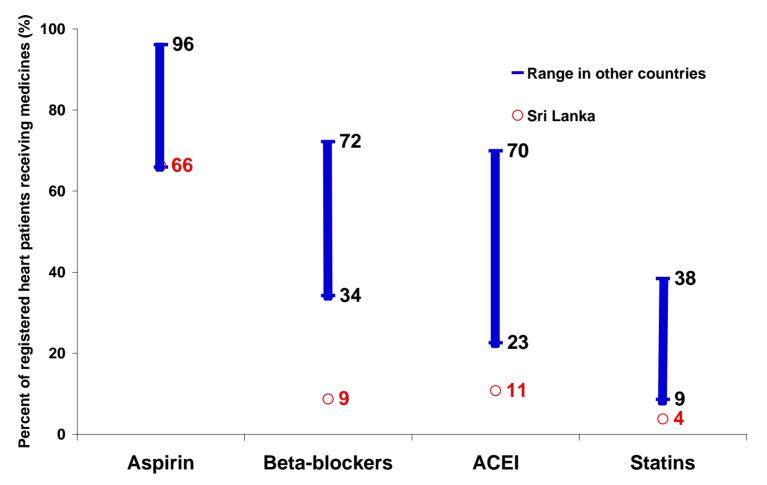
Prevalence of disability in elderly, by whether having heart disease (WB SLAS 2006 data)



Sri Lanka Finding 4 - Under-treatment of NCDs is systematic failure in otherwise effective and equitable health system



Systematic under-treatment of heart patients in public sector

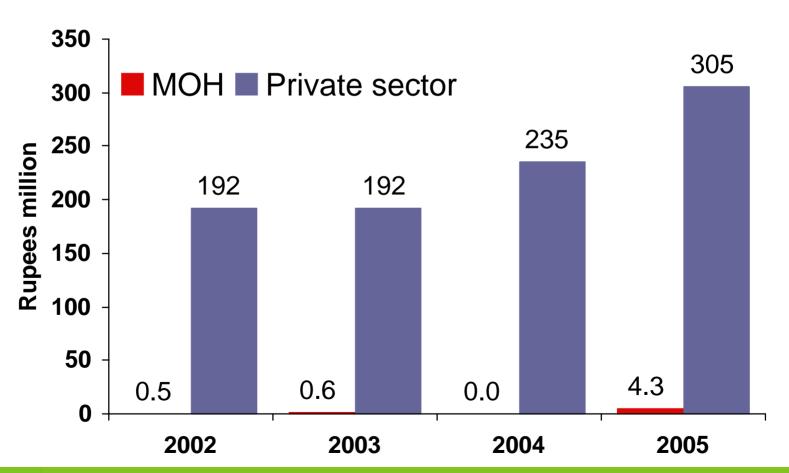


Survey of heart patients in 10 developing countries by WHO (Mendis et al., 2005)



... due to lack of public financing shifting cost of treatment to patients

Purchases of statins by MOH and private sector





Current situation

No national policy to treat NCDs

- Outdated focus on prevention only, no longer supported by scientific evidence
- No strategy for treating NCDs, or for rationalizing clinical management

Consequences

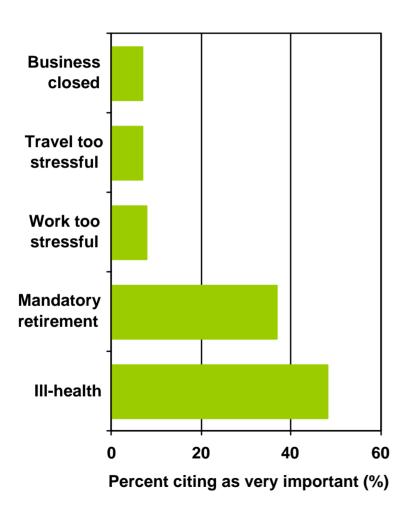
- Critical cost-effective NCD medicines not stocked
- Lack of NCD medicines largest cause of cost-sharing and patient dissatisfaction in public sector
- Source of increasing inequity in access to care and risk protection
 - Some patients cannot afford, and doctors may be withholding advice from others



Sri Lanka Finding 5 - Failure to treat NCDs is critical link between economic and public health responses



Ill-health in older workers is leading cause of withdrawal from workforce



WB SLAS 2006

- For private sector workers, ill-health is leading reason for older workers to stop working (>50%)
- For public sector workers, most important reason after mandatory retirement
- III-health is mostly chronic illness due to NCDs



Why the failure to reduce NCD burden matters for economy

- Increasing years in work and productivity of older workers must be core element in any economic response to ageing, but...
 - Workers will not support extending retirement ages unless they see real improvements in older adult health
 - Chronic illness and death due to NCDs directly reduces productivity in key age-groups
- Failure to treat contributes to future frailty and disability in elderly which increases long-term care costs



Policy recommendations



1. Reframe NCDs as an economic policy challenge, not just health

- Tackling the NCD burden is a key basis for increasing economy's capacity to cope with ageing
- Will require major changes in health sector approach to NCDs
 - Change is unlikely without appreciation that failure to respond has larger impacts than simply poorer health



2. Invest in public financing for health care

- Public dominance of health care financing cheaper in long-run for government and households than relying on private financing
- Will need to increase public expenditure on health as a share of GDP and as share of total health spending:
 - To effectively control cost pressures
 - To ensure macro-efficiency
 - To ensure adequate investment in new healthcare needs



3. Retool healthcare system to meet challenges of ageing and NCDs

- Current primary care system not designed for emerging challenges:
 - Lacks integrated management of elderly health and treatment of chronic disease
 - Placing increasing burden on poor owing to lack of provision for needed medicines
- Need to modernize primary care model:
 - Introduce general practitioner-led delivery system
 - New funding for chronic disease medicines to outpatients

