



Madrid, October 22<sup>nd</sup> 2009

# SOCIAL WELFARE-ENHANCING PHARMACEUTICAL POLICY

Vicente Ortún



CENTRE DE RECERCA  
EN ECONOMIA I SALUT · CRES  
UNIVERSITAT POMPEU FABRA

# Program on Pharmaceutical Policy Issues (PPPI): 10 years

- **Jeff Sturchio** had the idea, **Félix Lobo** saw *The Economist*



- Univ Carlos III (SESAM) and Univ Pompeu Fabra (CRES) applied together...and we have tried to deliver...

Thanks to our champions

**Regina Revilla & Paloma Fdez-Cano**

# Program on Pharmaceutical Policy Issues (PPPI): 10 years

- Education
- Research
  - e.g. 164 publications, with 44 under review or at working paper stage...*pendrive* ...

*and Borrell JR. Pricing and patents of HIV/AIDS drugs in developing countries. Applied Economics 2007; 39(4): 505-18.*

- Capacity building
  - e.g. 10 Ph D ...*pendrive*

# Education



TÈCNICAS DE MODELIZACIÓN  
EN EVALUACIÓN ECONÓMICA  
DE MEDICAMENTOS Y TECNO-  
LOGÍAS SANITARIAS”

I. SEMINARIO CRES DE ECONOMÍA DE LA  
SALUD Y DEL MEDICAMENTO:  
APLICACIONES BAYESIANAS  
EN ECONOMÍA DE LA SALUD

Barcelona, 19 y 20 de octubre de 2006

*V Seminario CRES de Economía de  
la Salud y del Medicamento*

Barcelona, 25, 26, 27 y 28 de marzo de 2009



# ...Education

## GLOBAL HEALTH LEADERSHIP FORUM

*An innovative program for senior health executives: a program from the University of California, Berkeley School of Public Health, and the Barcelona Graduate School of Economics*

**January 10-16, 2010**

**University of California Berkeley**



**School of  
Public Health**

UNIVERSITY OF CALIFORNIA, BERKELEY

**June 27-July 3, 2010**

**Barcelona GSE and CRES (UPF  
Economics and Health Research  
Center)**

barcelona|gse

graduate school of economics



**CENTRE DE RECERCA  
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# ...Education

## International Master in Health Economics and Pharmaeconomics (online)

*Online* training programme 2010-2011

### Presentation

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Organised by:



### Presentation

# ...Education

**M A D S** Master en Administración y Dirección de Servicios Sanitarios

**G A S P A R C A S A L**

**XXI Edición 2009 - 2010**

**75 ECTS**

**idEC** UNIVERSITAT POMPEU FABRA

**FUNDACION GASPAR CASAL**  
PARA LA INVESTIGACIÓN Y EL DESARROLLO DE LA SALUD  
[www.fgcasal.org](http://www.fgcasal.org)

Programa impartido en Madrid por la Fundación Gaspar Casal (FGC) en colaboración con el Instituto de Educación Continua (IDEC) y el Centro de Investigación de Economía y Salud (CRES) de la Universidad Pompeu Fabra

**CENTRE DE RECERCA EN ECONOMIA I SALUT-CRES**  
UNIVERSITAT POMPEU FABRA

# Research areas at CRES

1. Development and health
2. Sustainability of the Welfare State
3. Innovation
4. Nature of competition in the pharma industry
5. Regulation of Pharmaceutical Industry
6. Efficiency in health policies & health services
7. Bridging the quality chasm

# 1. Development and health

## Poverty leads to poor health

- Poor cannot afford medical care
- Poverty does not induce R&D (Tropical Diseases)
- Poor people are malnourished (immunodeficiency)
- Poor have less access to water and sanitation (diarrhea, cholera, typhoid fever)
- Poor live away from doctors and hospitals
- Poor are less likely to be educated
- Poor girls are less likely to be able to refuse sex with powerful rich men

# ...Development and health

## Poor health leads to poverty

- Health investments (despite improving social welfare and even productivity) have led to economic growth
  - NOT ALWAYS: After the 1940's –in countries poorer than Spain- population boom originated a *decrease* in income per capita (diminishing returns because capital and land increased at a lower rate than population)

*Acemoglu D, Johnson S. JPE 2007; 115(6): 925-985*

# Development and health..However...

What people care about is not *income* but *utility*: a function not only of consumption, but of not suffering with or dying from disease as well as not watching one's loved ones suffer and die.

People value life and health. Calculations suggest that the direct utility benefits of health improvements far outweigh any indirect utility benefits from raising income.

Thus any positive effects of health improvements on economic growth are going to be marginal in cost-benefit calculations regarding health improvements.

<http://www.growthcommissionblog.org/content/health-and-growth-a-heretical-view>

# How to get out of the TRAP?

Tackle health and growth **simultaneously!!**

- Good education system does not pay if kids have no incentives due to health
- Good health system does not pay if people remain poor, and subject to other diseases
- Need to get them both at the same time

# To Promote Growth...

Institutions: property rights, free society, justice, peace.

Right environment for business.

Macroeconomic Stability

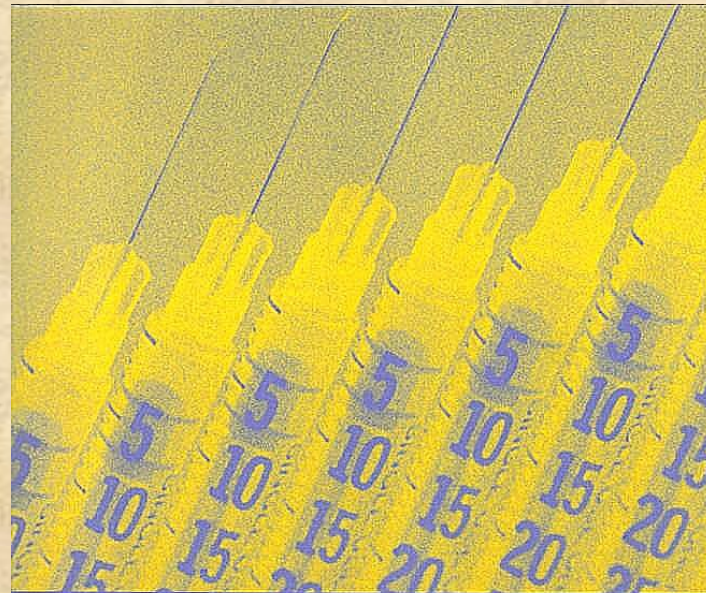
Investment in Education

Investment in Infrastructure

Openness: on both sides (including less European and American Protectionism)

Always keep an eye on Poverty Reduction: Political Instability

# ...Development and health



## Health and Economic Growth

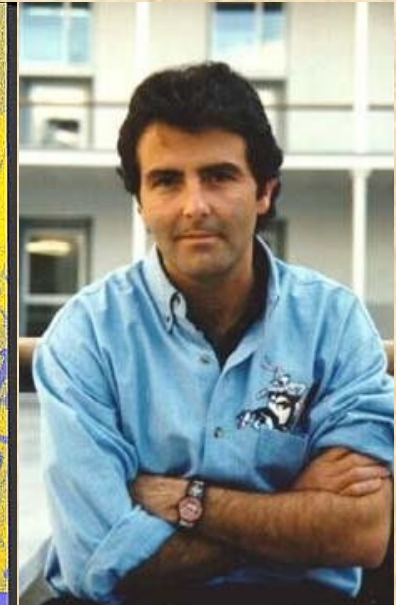
FINDINGS AND  
POLICY IMPLICATIONS

EDITED BY

GUILLEM  
LÓPEZ-CASASNOVAS

BERTA RIVERA

LUIS CURRAIS



**Xavier Sala-i-Martin**

# 2. Sustainability Welfare State

**FIGURE 1**

**THE FOUR EUROPEAN MODELS  
A TYPOLOGY**

Equity

Efficiency

Low

High

High

CONTINENTALS

NORDICS

Low

MEDITER-  
RANEANS

ANGLO-  
SAXONS

V. Ortún Economía de la Salud y Gestión Sanitaria

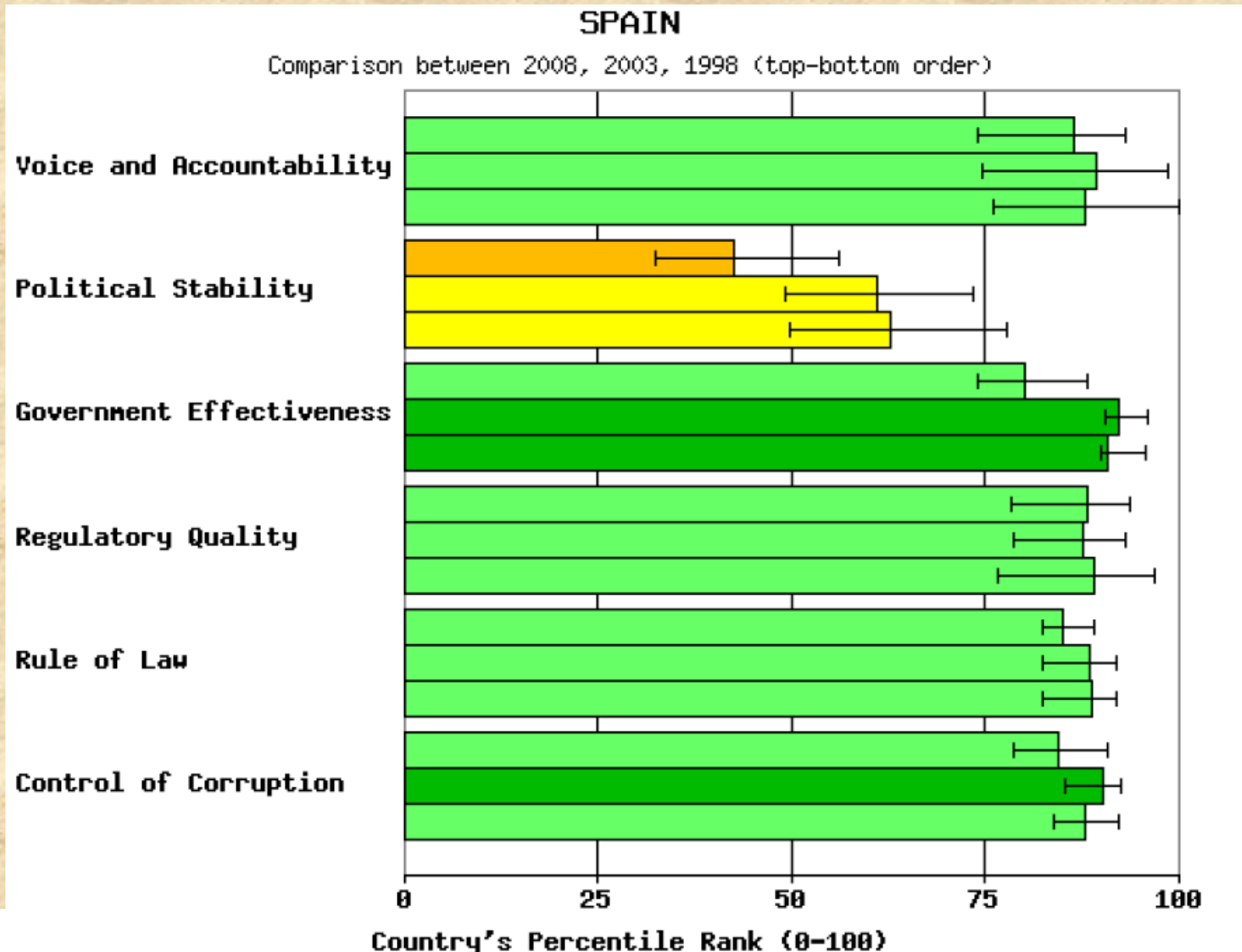
Jaume Puig-Junoy (*director*)  
Guillem López-Casasnovas  
Vicente Ortún Rubio

¿Más recursos  
para la salud?

MASSON



# ...Sustainability Welfare State



Source: Kaufmann D., A. Kraay, and M. Mastruzzi 2009: Governance Matters VIII: Governance Indicators for 1996-2008

# ...Sustainability Welfare State

## Institucional weakness

- ‘Partitocracy’, the rule of political parties staffed with personnel which professional future depends on the party itself
- Public Admon, less a policy instrument than a way of sharing out the spoils
- Checks and balances (judicial system, media, public opinion, internal controls...) are failing

# ...Sustainability Welfare State

There is no intrinsic contradiction between high productivity and a consolidated National Health Service (welfare state) as the European Nordic Countries tell us every day

Better politics for a better public management

- Political parties finances, Electoral system, Media control...

# ...Sustainability Welfare State

Productivity increase and consolidation of the welfare state. Truly independent body, with a clear mandate, would:

- Implement social consensus on pensions, health care and social services
- Incorporate NICE type assessments and clinical guides

# 3. Innovation



MANAGEMENT SCIENCE

Vol. 55, No. 4, April 2009, pp. 539–551

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## R&D in the Pharmaceutical Industry: A World of Small Innovations

Juan-José Ganuza

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# ...Innovation

- Too much research will be devoted to currently successful products and technology lines rather than potentially transformative, if risky projects
- Patent system rewards incremental improvements
- To maximize profits, scientists tend to work on existing devices, creating a large quality gap between those technologies and their languishing potential replacements

# ...Innovation



**Daron Acemoglu, MIT**

- What seems logical for technology companies, one by one, may not be the best for the entire economy
- Government should actively encourage technological change and can expect to find a broad range of research ideas specifically in universities, the nerdiest ones.

# Policies to promote innovation

Innovation infrastructure: basic research, education system...

Firm's clusters: Competitiveness

Links between a country's innovation infrastructure and their firms

*Most often: To forget about improving the three pillars mentioned above and just try to improve returns of private innovation efforts by means of subsidies, soft credits, tax rebates...*

# R&D location factors

Benefits (depending on  $p$  and  $q$ ) drive R&D... but not R&D location

Quality of common innovation infrastructure

- Highly skilled workforce with relevant scientific qualifications
- Tradition of public and private qualified R&D

Environment for innovation in nation's industrial clusters, degree of competition-based innovation...

- Presence of opinion leaders in the medical field
- Access to high quality clinical trials infrastructure

Quality of science-industry knowledge transfer channels

# 4. Nature of competition

Rev Ind Organ (2009) 34:373–388  
DOI 10.1007/s11151-009-9214-3

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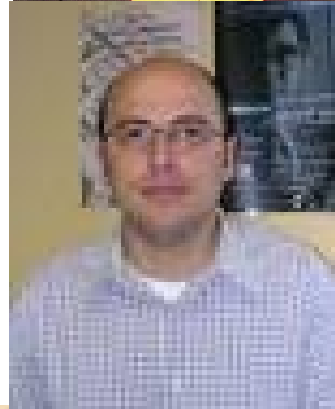
Ivan Moreno



## Generic Entry into the Regulated Spanish Pharmaceutical Market

Iván Moreno-Torres · Jaume Puig-Junoy ·  
Joan-Ramon Borrell

JR Borrell



# ...Nature of competition

Spanish regulation might drive out competition  
contrary to what policy makers might expect

The system of reference pricing restrains  
generic entry

- Since January 2004 the reference price has come to be a system for setting a maximum reimbursement price for branded and generic drugs

# ...Nature of competition

Drivers of generic entry similar in strictly price regulated Spain than in more market-friendly environments.

Evidence shows that reference price systems constrains the take-off of generic markets

- Lower price, main advantage of generics...but
- Brand-name generics known by physicians and patients
- When RP implemented in any active ingredient market, brand-name firms quickly set prices very close to RP
- Convergence in prices has caused generic drugs to lose their main advantage because generic drug prices have become very similar to brand drug prices

# 5. Regulation of pharmaceutical industry

## Pharmaceutical distribution:

- Unfair monopolies
- Capture of the regulator
- Unsuitable payment schemes



HEALTH POLICY DEVELOPMENTS

Lampedusa and pharmaceutical  
distribution: community  
pharmacy in the 21st century

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Ricard Meneu

# ...Regulation of pharmaceutical industry

## Economic Evaluation not yet seriously introduced in Spain

- Appropriate approach for decisions about coverage: Incremental Cost-Effectiveness Ratio
- Indicative threshold of the maximum cost that society is willing to pay for and additional QALY

(does not require to fix the price of the new medication at the threshold of the willingness to pay)



**Jaume Puig-Junoy**

# 6. Efficiency in health policies & health services

Improved health, important part of welfare



Required efficiency in the production of health



Prices should reflect relative effectiveness  
(role for economic evaluation)

# ...Efficiency in health policies & health services



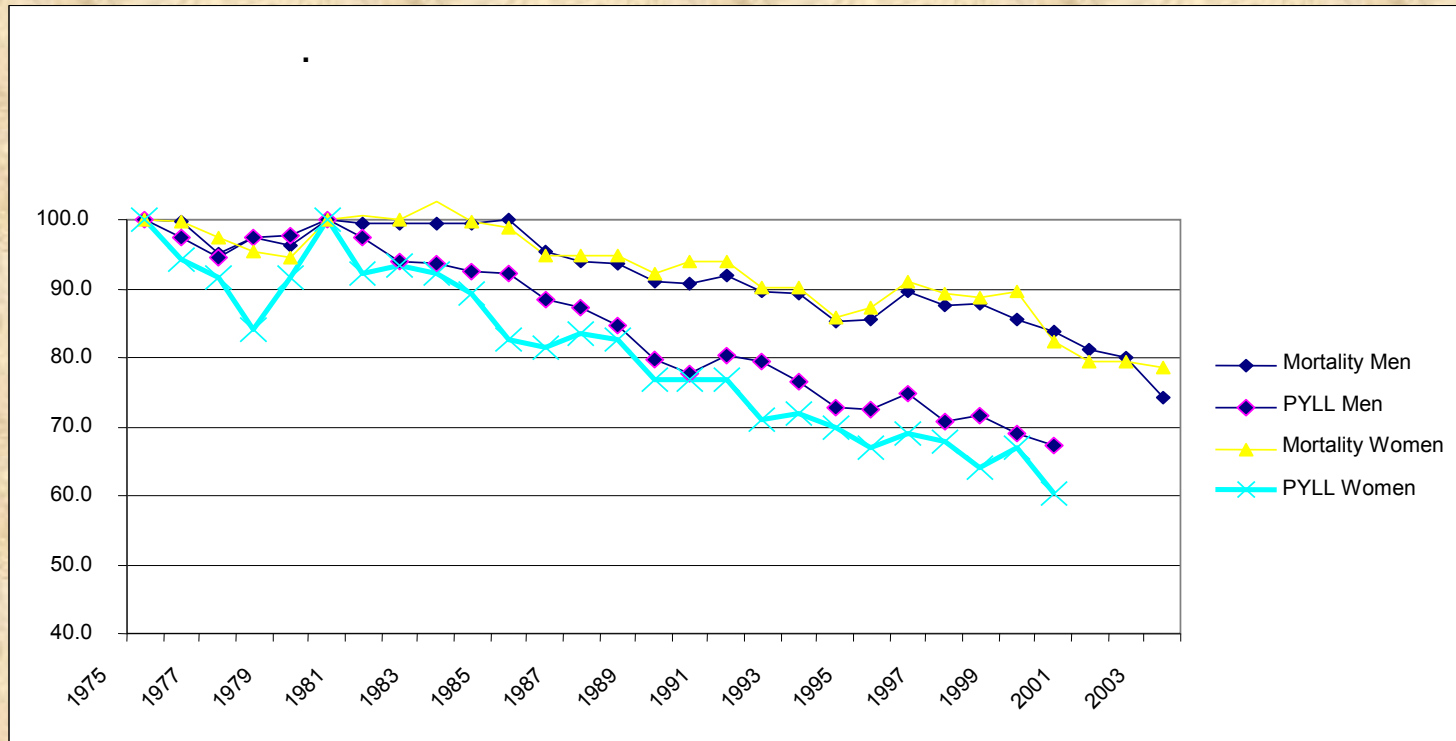
Volume 11 • Number 1 • 2008  
VALUE IN HEALTH

## The Impact of Medical Technology on Health: A Longitudinal Analysis of Ischemic Heart Disease

Beatriz G. López-Valcárcel, PhD, Jaime Pinilla, PhD

University of Las Palmas de Gran Canaria, Las Palmas de Gran Canaria, Spain

# Medical Tech Advances in Spain worth the cost : 25.000€/life in AMI



Potential Years of Life Lost, OECD database. Cut-off at 70 years  
(underestimation of gains)

# 7. Bridging the quality chasm

HEALTH ECONOMICS  
*Health Econ* 17: 119–126 (2008)

ORIGINAL RESEARCH ARTICLE

Pat  
HEALTH ECONOMICS

Regulación, innova

Centre de Recerca e

V. Ortún Economía de la Salud y Gestión Sanitaria

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V. Ortún Economía de la Salud y Gestión Sanitaria

V. Ortún Economía de la Salud y Gestión Sanitaria

é Luis Pinto  
é María Abellán  
nando Ignacio Sánchez

Guillem López-Casasnovas

El interfaz  
público-privado  
en Sanidad

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MASSON





# VPM Atlas

## de Variaciones en la Práctica Médica

### EN EL SISTEMA NACIONAL DE SALUD

MAYO, 2009  
VOLUMEN 3  
NÚMERO 2

Vicente Ortún Rubio

## Gestión clínica y sanitaria

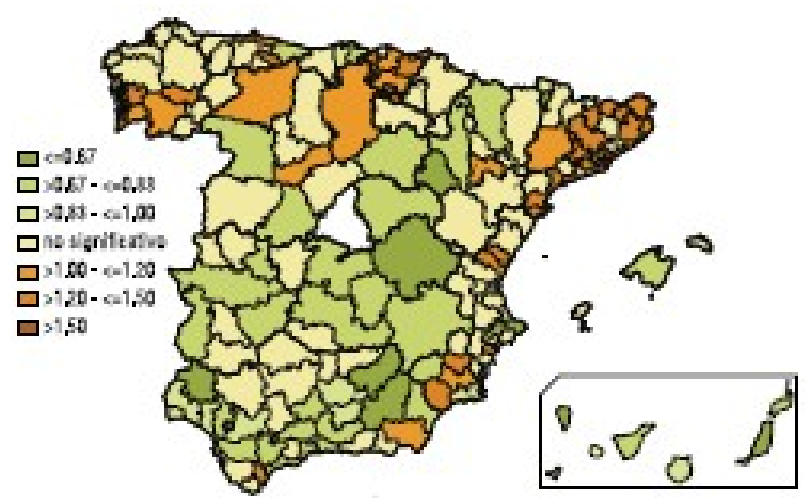
De la práctica diaria a la academia, ida y vuelta

MASSON

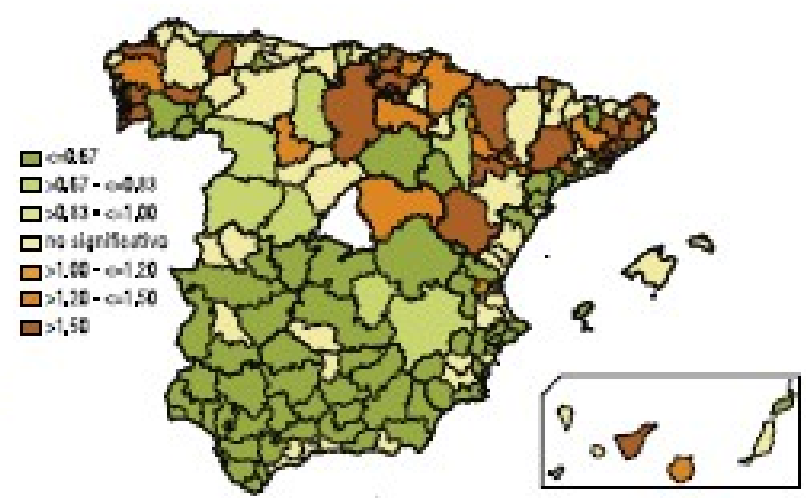
### Variaciones en hospitalizaciones por cirugía oncológica en el Sistema Nacional de Salud.

Gloria Oliva,<sup>a</sup> Alejandro Allepuz,<sup>a</sup> Anna Kolzeva,<sup>a</sup> Cristian Tebbé,<sup>a</sup> Enrique Bernal-Delgado,<sup>b</sup> Salvador Peiró,<sup>c</sup> Julián Librero,<sup>b,c</sup> Manuel Rizado,<sup>b,c</sup> y Grupo VPM-SNS.

Colon



Próstata



# Shared view



Lesotho

Binh Lu,  
Vietnam