



CONSORCIO DE

COMPENSACION

• DE SEGUROS •



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PANDEMICS: AN INSURANCE POINT OF VIEW

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“A pandemic is a global disease outbreak”

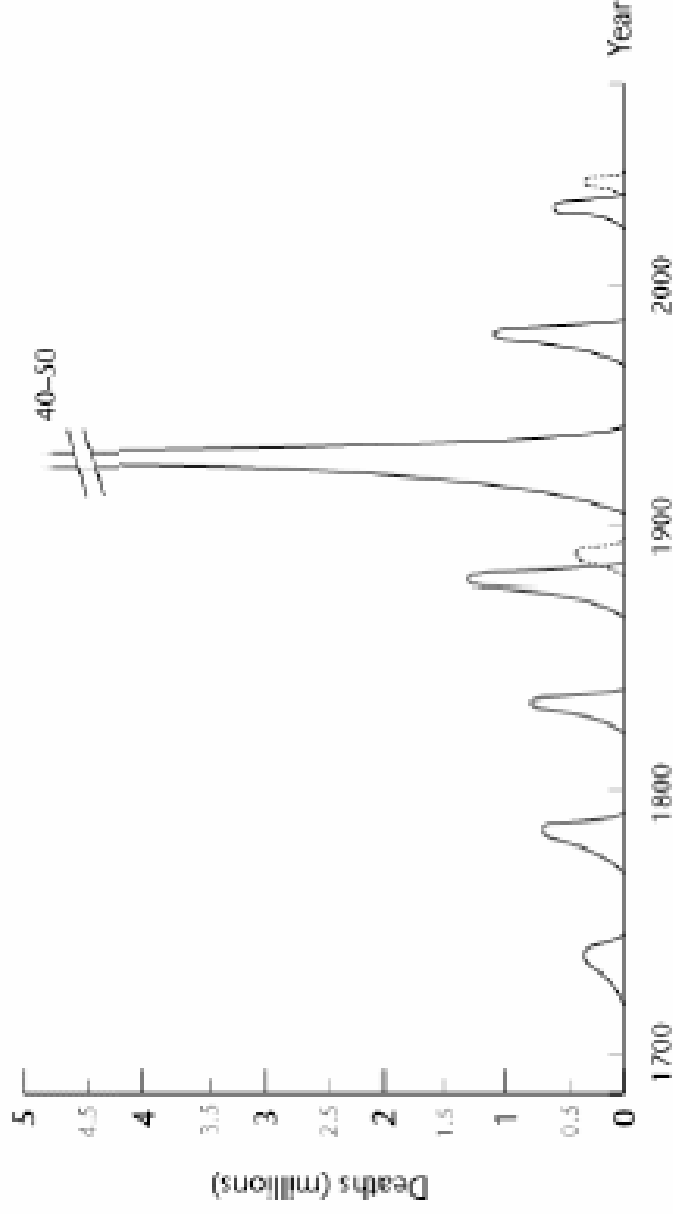
“A flu pandemic occurs when a new influenza virus emerges for which people have little or no immunity. The disease spreads easily from person to person, causes serious illness and can sweep around the world in a very short time”



Pandemics occur at regular intervals: every 30-50 years

Since 1700: 10-13 pandemics in the world

The question is not if it will occur but when and how



AON (2005)



Three pandemics in the 20th century:

- Spanish flu (1918-1919):
 - * 50 million deaths (4% of the global population)
 - Infection rate: 30%
- Asian flu (1957-1958):
 - * 2 - 4 million deaths
- Hong Kong flu (1968-1969):
 - * 1 million deaths

Last pandemic:

- SARS (Severe Acute Respiratory Syndrome)- 2003
 - People infected: 8.000 (fatality rate: 9.6%)
 - Economic losses: USD 60 billion



Current WHO phase of pandemic alert

		1
Inter-pandemic phase	Low risk of human cases	
New virus in animals, no human cases	Higher risk of human cases	2
Pandemic alert	No or very limited human-to-human transmission	3
New virus causes human cases	Evidence of increased human-to-human transmission	4
	Evidence of significant human-to-human transmission	5
Pandemic	Efficient and sustained human-to-human transmission	6



Nowadays

- **Factors for increased vulnerability:**
 - More urbanized population
 - High population densities
 - Modern transportation (globalization)
 - More long-distance contacts
 - More journeys
 - Higher vulnerability in poor areas
- **Factors for decreased vulnerability:**
 - Control and test (ability, tools and coordination)
 - Information and data transmission
 - (distance, dissemination and speed)
 - Scientific knowledge and research
 - Remedies distribution



Foreseeable effects (based on SARS experience)

Pandemic Scenario (worldwide impact)

- **Mild scenario:**
 - **1,42 million deaths (0.022 % mortality)**
 - **Economic losses: USD 330 billion (0.8 % of PDG)**
- **Moderate scenario:**
 - **14,2 million deaths (0.22 % mortality)**
- **Severe scenario:**
 - **71,08 million deaths (1.1 % mortality)**
- **Ultra scenario:**
 - **142,2 million deaths (2.21 % mortality)**
 - **Economic losses: USD 4,4 trillion (12.6 % of PDG)**



Factors conditioning the pandemic impacts

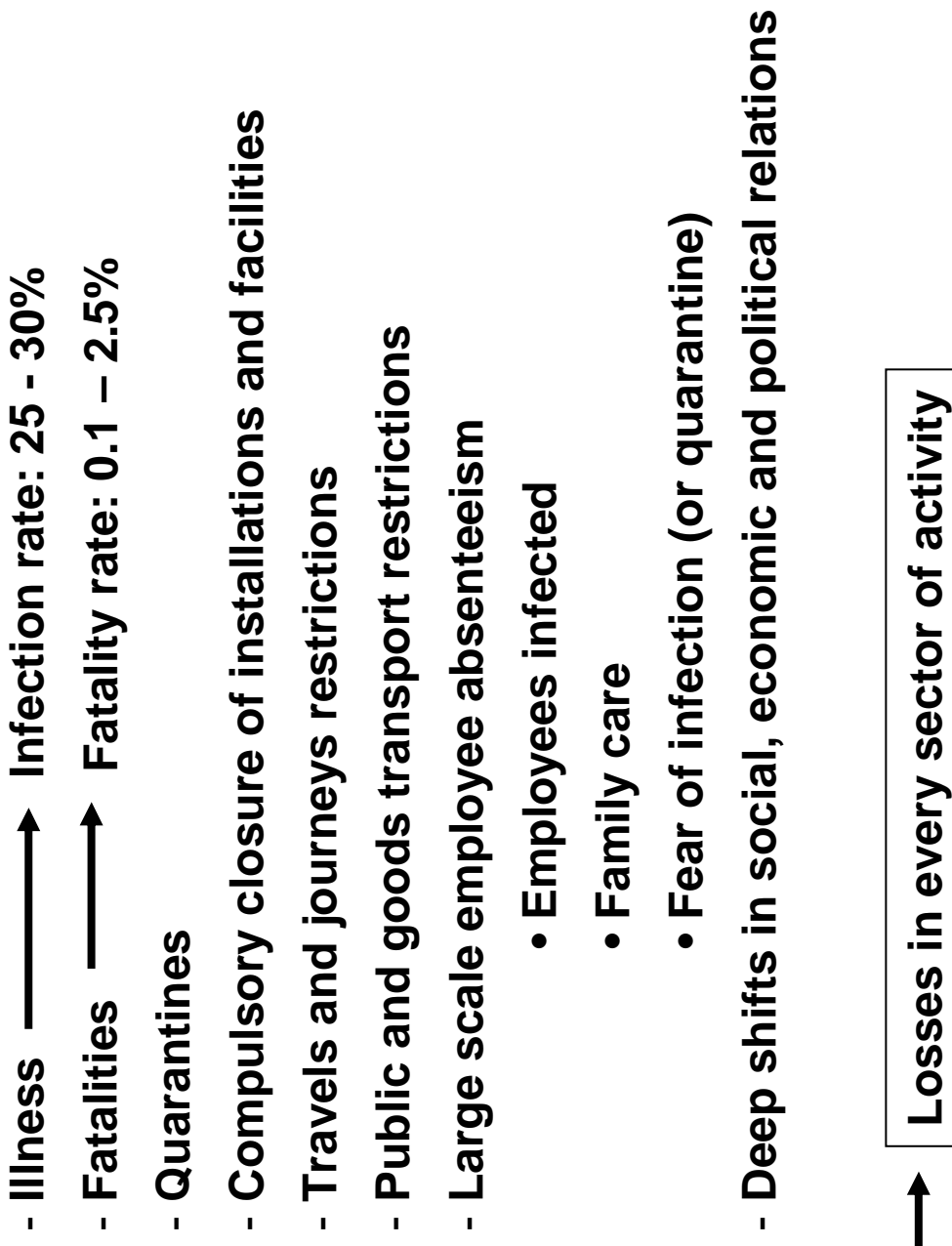
- **Severity (morbidity and mortality)**
- **Spread (and speed)**
- **Age range more vulnerable**
- **Duration (all phases)**
- **Prevention, cure and protection measures**

Uncertainty about the pandemic nature and behaviour



Uncertainties about severity and nature of the impacts

Pandemic effects



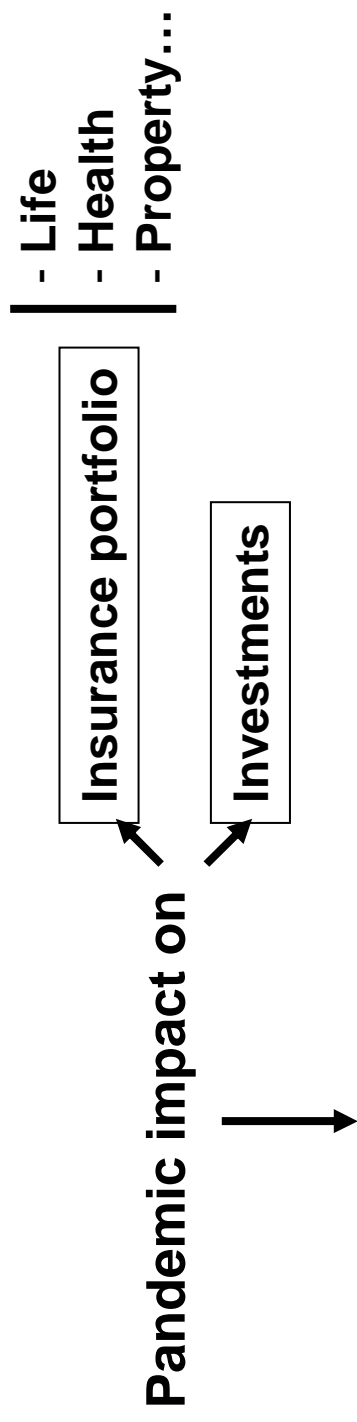
Pandemic effects

These effects would also affect insurance carriers

- **Operational Risks** → **Contingency plans**
- **Asset Risks** → **High vulnerability**
- **Insurance Liability Risks**



Impact on insurance and reinsurance companies



Balance sheet and liquidity concerns





Insurance liability risks Policies affected:

- **Life insurance.** The greater risk exposure: depending on range of age affected
- **Health insurance**
- **General Liability.** Negligence and measures adopted by public policymakers
- **Products Liability.** Claims against prevention equipment manufacturers
or vaccine makers because ineffective remedies...
- **D&O.** Claims from shareholders against companies because lack of or deficiencies
in contingency plans.
- **Property.** More incidence in regular risks –fire, theft- due to reduced
risks management; civil unrest...
- **Cargo.** Goods refused, transport interruption...
- **Workers compensation.** Only special services: medical attention, poultry farms,
education...
- **Business Interruption.** Uncertain trigger



Low frequency

High severity

Natural catastrophes



Natural trigger

Usually confined to a limited geographic area, but potential impact on a country or a region (storms) in a short time frame.

- Property insurance losses**
- Personal insurance losses**



Low frequency

High severity



Potential impact on an entire country or region in a short time frame.

- Property insurance losses**
- Personal insurance losses**



Low frequency

High severity

Pandemic influenza



Natural trigger
Human trigger (terror.)

**Potential impact on a region,
or worldwide, in a short
time frame.**

- **Personal insurance losses**
- **Property insurance losses**

Uncertainties on

- **Nature and behaviour (morbidity, mortality, age range)**
- **Geographical widespread**
- **Official declaration (when)**
- **Duration (every phase)**



WAR

PANDEMIC

Great impact ← personal losses (life, health) → Great impact



Uninsurable risk

Uninsurable risk

Great impact ← Property and casualty losses → Moderate impact



Uninsurable risk



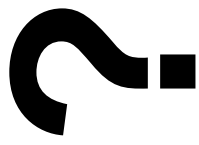
Low or moderate effect In lot of lines

Wide geographic areas affected



Three main questions

Is pandemic an insurable risk?



Is the private market willing to cover pandemic risk?

Should public authorities take part in the insurance solutions?



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