

Southern California Summit on Cross-Sector Pandemic Influenza Planning

Why are we here?

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Is avian influenza still a threat ?

H5N1 in 2007

- 86 cases, 59 deaths
- First human cases in Pakistan, Laos, Myanmar, Nigeria
- **December**
 - Human-to-human transmission of H5N1 in families in Pakistan and in China
 - Four fatalities in less than a week from H5N1 in Egypt, the most populous Arab country
 - Bird outbreaks in China, Bangladesh, Myanmar, Vietnam, Israel, Egypt, Pakistan, Poland, Russia, Saudi Arabia

Update on Human H5N1

WHO writing group, *NEJM* 2008

- Eight distinct clades (0-8), or subgroups, multiple subclades: Six caused human infections
- 60% case fatality ratio
 - highest in 10-19 yrs old, lowest in 50 and up
 - little evidence of mild or asymptomatic human infections (1:1232 positive in serosurveys)
- clusters identified in 10 countries
 - 25% of all the human cases
 - 90% involve only blood relatives
- H5N1 can cause systemic infection
 - Predominant clinical feature--pneumonia

Requirements for a Pandemic

- Unusual type of influenza virus found in humans
- Little or no immunity in the population
- Virus can multiply and cause disease in humans
- Easily spreads from person to person

Human influenza transmission

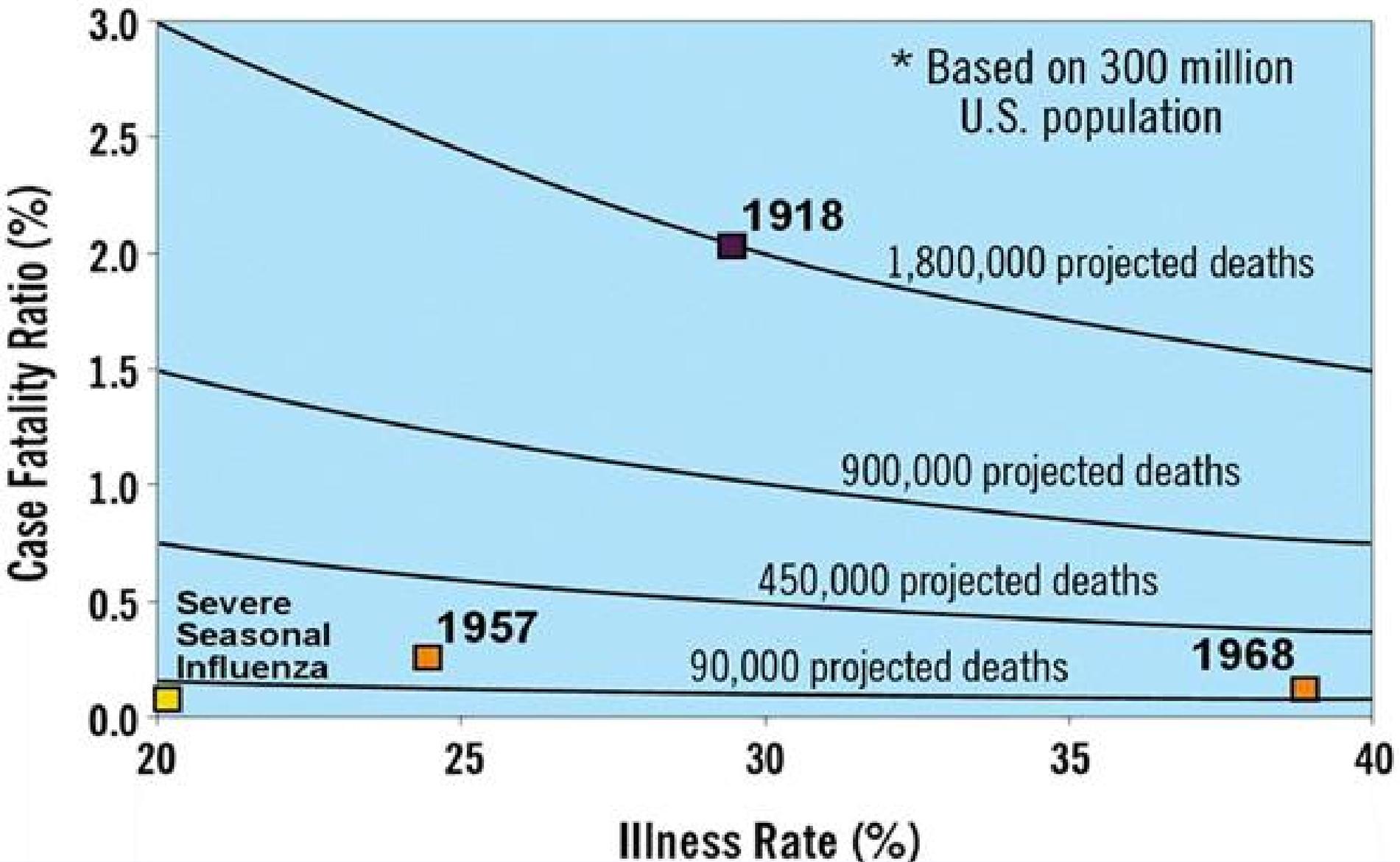


Pandemics over the Past 300 Years

Range; 10 to 49 years between pandemics.
Average; 24 years

- 1732-33
- 1781-82
- 1800-02
- 1830-33
- **1847-48**
- 1857-58
- **1889-90**
- **1918-19**
- 1957-58
- 1968-69

Pandemic Severity Index



Goals of a National Pandemic Response

“The federal government will use all instruments of national power to address the pandemic threat”

- Stop, slow, or limit the spread of the pandemic to the U.S.
- Limit domestic spread and mitigate disease, suffering, and death
- Sustain infrastructure and mitigate impact on the economy and society



Any local government that fails to prepare expecting the federal or state government to step in will be tragically wrong.

HHS Secretary Michael Leavitt

CA Pandemic Influenza Summit Mar 30, 2006



Planning Assumptions

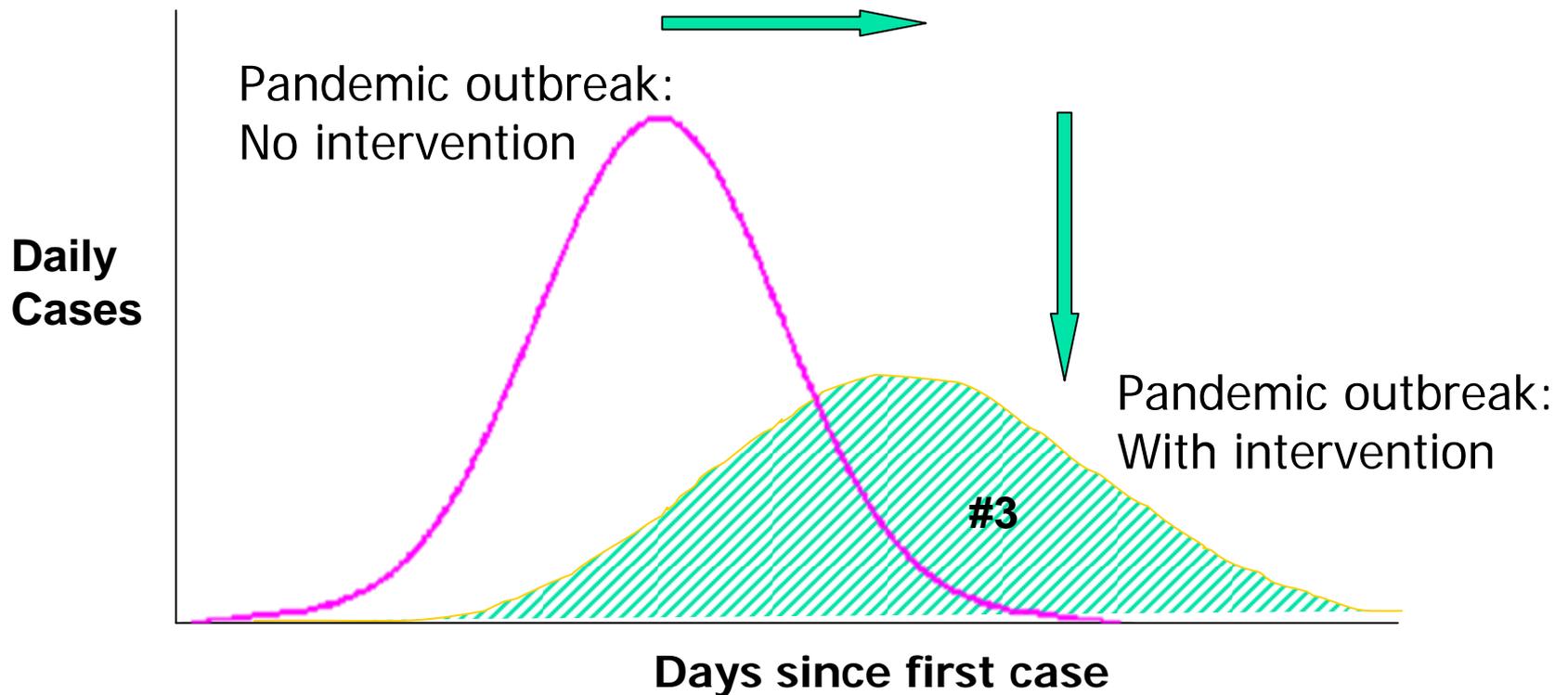
- No “business as usual”
- All sectors of society and government involved
- Limited mutual aid
- Requires sustained response
- Disruption of workforce, not physical infrastructure

Pandemic Assumptions

- Rapid worldwide spread
- Health care systems will be overloaded
- Medical and other supplies will be inadequate
- Economic and social disruption

Community-Based Interventions

1. Delay disease transmission and outbreak peak
2. Decompress peak burden on healthcare infrastructure
3. Diminish overall cases and health impacts



Outbreak Containment

Measures vary as pandemic develops

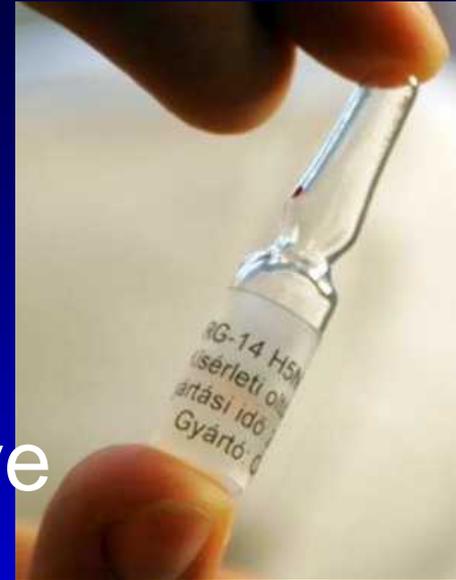
Pharmaceutical interventions

- vaccine and antivirals

Community-based interventions

- Isolation (confinement) of ill persons
- Quarantine exposed
- Reduce individual exposure to virus
 - Limit public contact
 - Cancellation of school classes

Vaccine for Avian and Pandemic Flu



- Current flu vaccine is not protective
- New H5N1 vaccines limited effect
- Federal gov to develop pandemic vaccine
- Goal: 300 million doses within 6 months
- Priorities different from seasonal flu
 - Maintain health care and critical services



Anti-viral Medication

- Increasing availability
- Focus on treatment
- Initiate therapy within 12-24 hours of illness onset
- Prophylaxis, If supplies allow
- Implementation challenges—prioritization, distributing, dispensing, and monitoring
- Potential viral resistance



	Pandemic Severity Index		
Interventions* by Setting	1	2 and 3	4 and 5
Home			
Voluntary isolation	Recommend †§	Recommend †§	Recommend †§
Voluntary quarantine	Generally not recommended	Consider ***	Recommend **
School			
Child Social distancing			
dismiss classes	Generally not recommended	Consider: ≤4 weeks ††	Recommend: ≤12 weeks §§
Reduce out of school contact	Generally not recommended	Consider: ≤4 weeks ††	Recommend: ≤12 weeks §§
Workplace / Community			
Adult social distancing			
work place	Generally not recommended	Consider	Recommend
transit	Generally not recommended	Consider	Recommend
public gatherings	Generally not recommended	Consider	Recommend
	Generally not recommended	Consider	Recommend

* telework, staggered shifts

Coughing spreads germs. Protect yourself and others.



- Cover your cough.



- A face mask may be needed if you are coughing.



- Wash hands often.



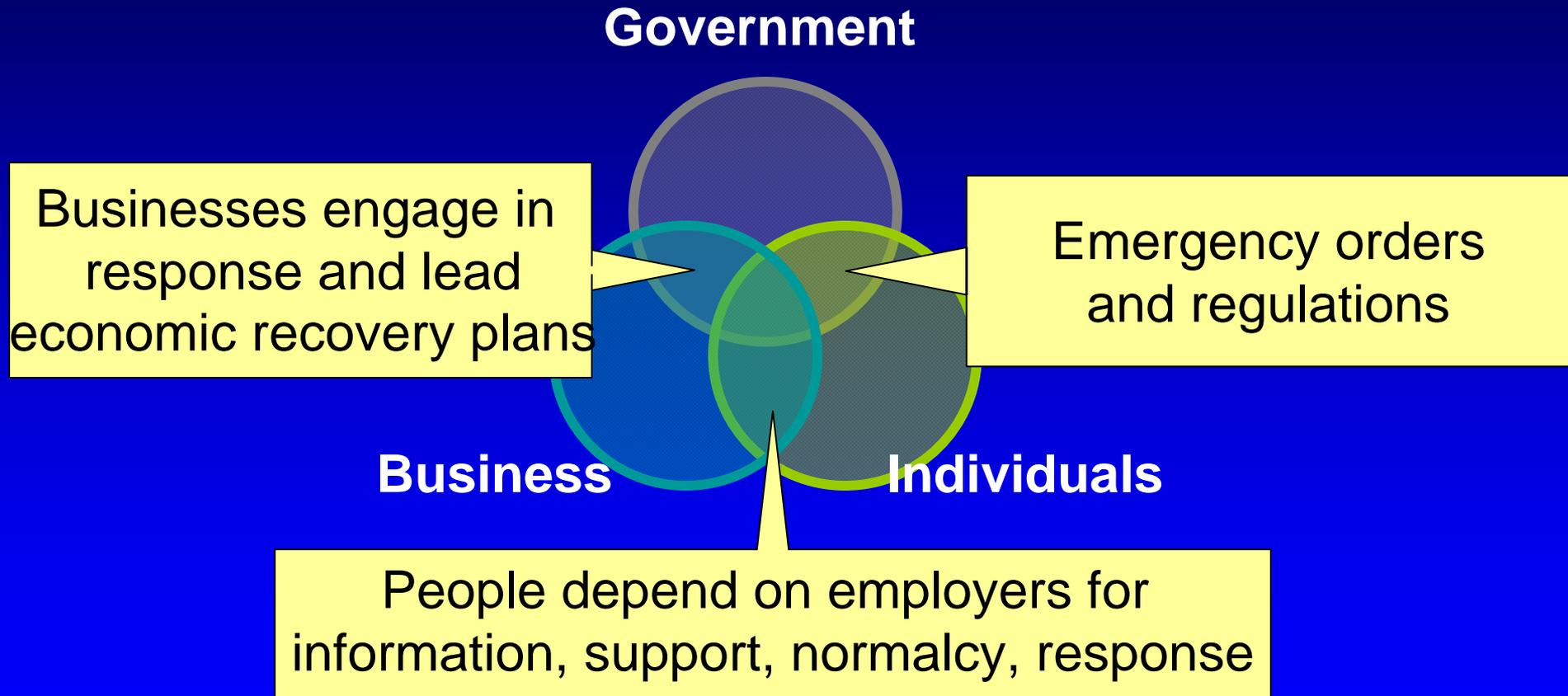
Homeland Security Presidential Directive 21

Strategic improvements to "deliver appropriate care to the largest possible number of people, lessen the impact on limited healthcare resources, and support the continuity of society and government."

- National epidemiologic surveillance system
- Countermeasure stockpiling and distribution
- Mass casualty care: how federal facilities can support medical surge-capacity plans
- Addressing mental health consequences of a disaster
- Community resilience and preparedness (HHS, along with the Defense, Commerce, Labor, Education, Veterans, and Homeland Security departments)



Relationships are altered during an emergency



Networked Government



Sector Responsibilities

- Continuity of Operations
 - Staff support
 - Critical services and supplies
- Support government response and community containment
- Community partner
- Economic recovery

Regional Summit Goals

- Develop an actionable, multi-sectoral approach and on-going processes to further collaboration and resilience
- Test assumptions underlying the responses of public and private sector stakeholders
- Identify pandemic influenza cross-sector resource and communication challenges for government, healthcare, business, essential services, community-based organizations, and academic institutions

“Preparation is a continuum. Each day we prepare brings us closer to being ready. We are better prepared today than we were yesterday. And we must be better prepared tomorrow than we are today.”

HHS Secretary Leavitt