

Measuring the Economic Impacts of Climate Change on Children's Health

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Presidential Documents

Title 3—

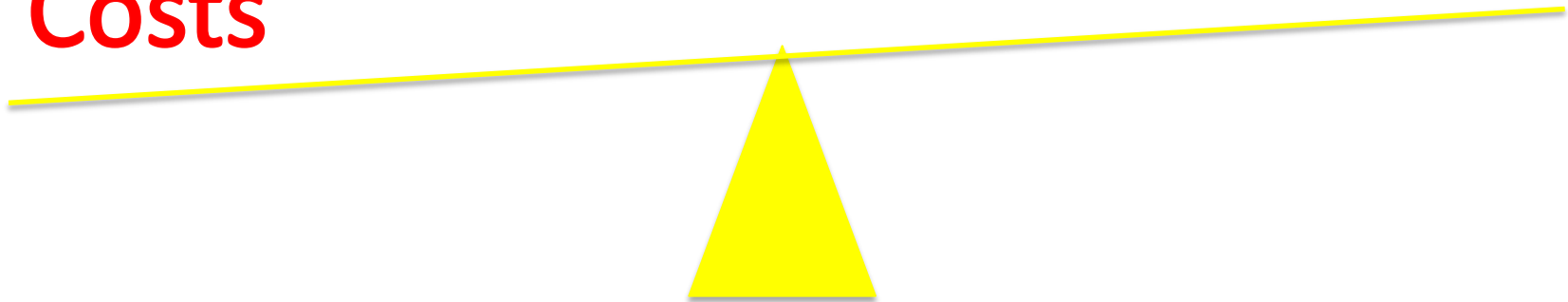
Executive Order 12866 of September 30, 1993

The President

Regulatory Planning and Review

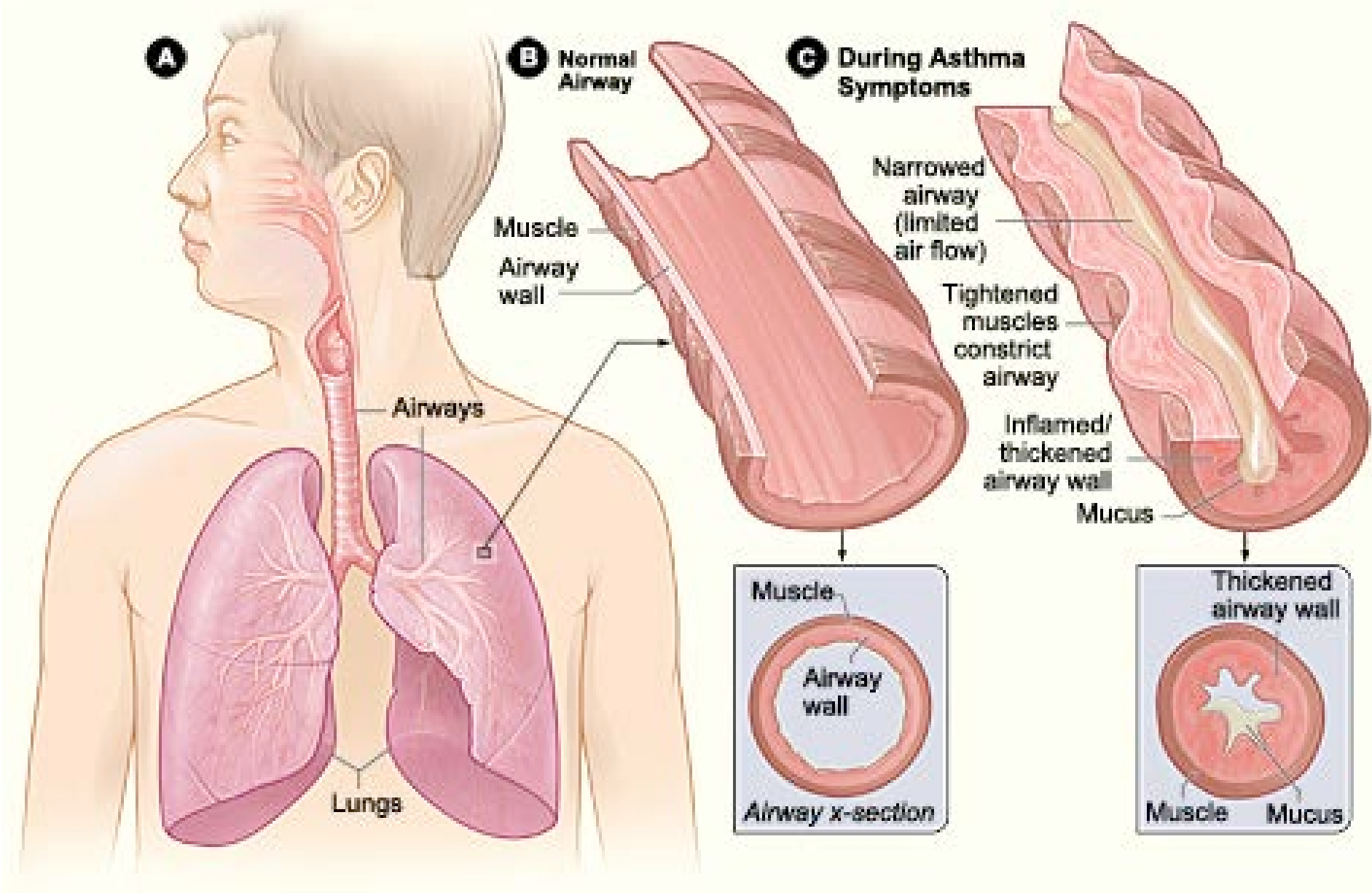
Costs

Benefits



[rg/news/press-releases/report-obama-carbon...](#)

Report: Obama

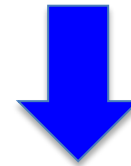


Measurement Issue 1:

How do we identify the health outcomes that are attributable to climate change?

Change
in ozone

Change in
ragweed



Asthma exacerbations



Increased asthma burden

Extreme heat events more frequent



Low birth weight



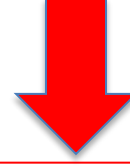
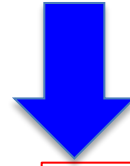
Asthma prevalence



Change in ozone



Change in ragweed



Asthma exacerbations



Increased asthma burden

Measurement Issue 2:

How do we value caregivers'
time and effort?

25% of days of school missed due to asthma are assigned a value of zero.

Why?

25% of “mothers” would be home even in absence of an asthma attack.



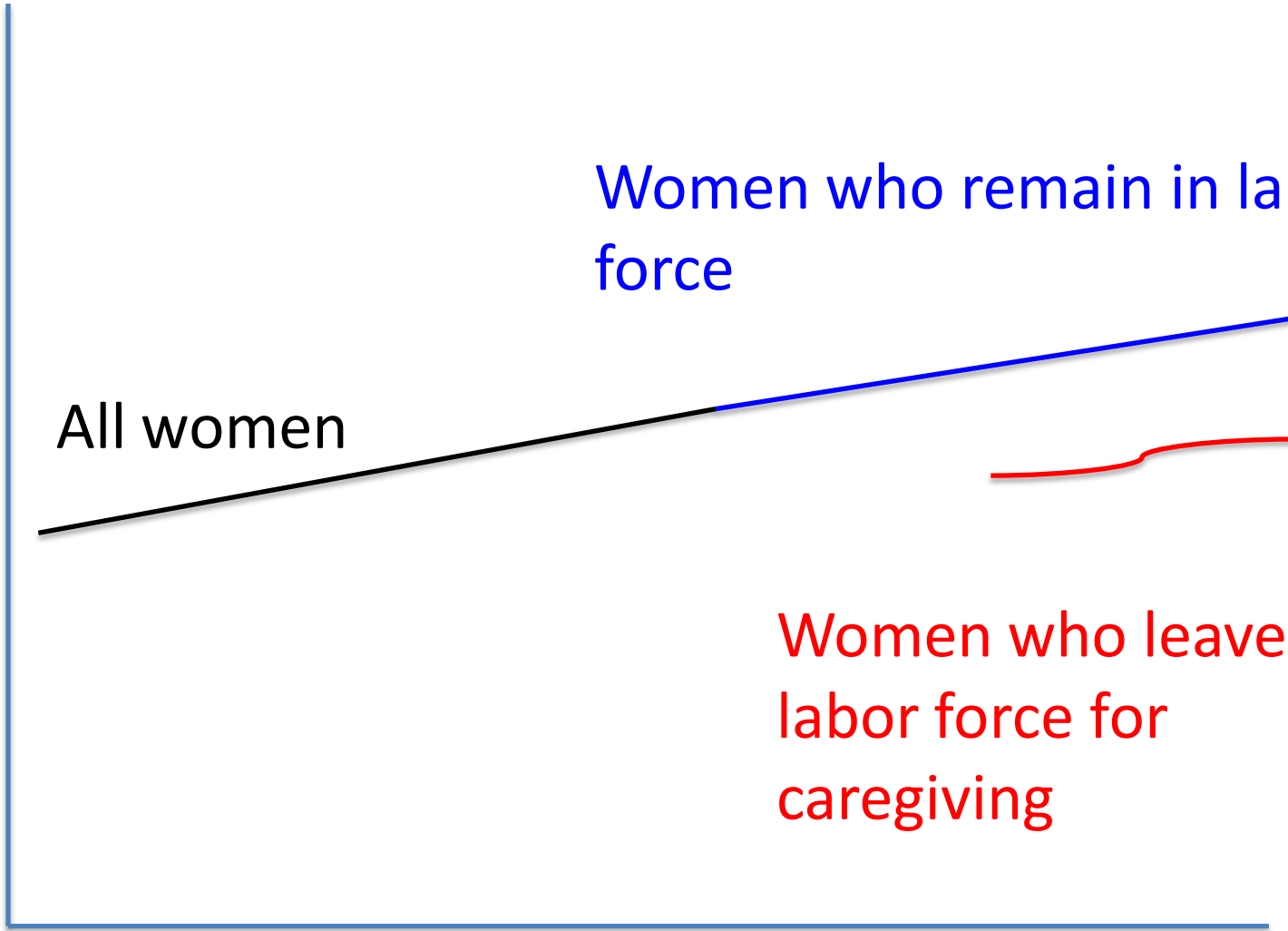
VOLUNTEERS NEEDED!



Of caregivers for children with asthma, 18% had been forced out of the labor market.

Hanemann and Brandt (2003).

wages



Women who remain in labor force

All women

Women who leave labor force for caregiving

time

Measurement Issue 3:

How do we value the impacts of illness on the quality of life?

No asthma symptom day



Bad asthma day



\$19/day (Brandt et al. 2012)

\$11-16/day (Rowe & Chestnut, 1986)



Quality of life impact > \$100/month

Brandt et al. (2012)

Measurement Issue 4:

What are the missing pieces?

Agenda for Action

- Reform guidelines used to calculate benefit of pollution reduction.
- Fund integrative research where economic analysis is tied to epidemiological evidence and clinical experience.
- Make the economic case for prevention and connect with a social justice argument.

For more information

<http://www.umass.edu/resec/faculty/brandt/index.shtml>

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