

Patient Case: Sick/Not Sick

- Fever: average temp increased
- Overall condition: forests unhealthy, massive fires,
- Circulation: acidic, warmer(> rapid ocean storm growth), ?slowing
- Sweats: extreme precipitation events
- ► U/O: increased melting ice sheets
- ▶ Resp: ↑ CO2
- Misc: pathogens spreading (Vibrio, vector-borne)

Crisis?

Discussion Topics

- ACP climate actions
- US Climate actions, including legislation
- Montana actions and opportunities

ACP Climate Actions

- 2016: Climate change and health position paper: https://annals.org/aim/fullarticle/2513976/climate-change-health-position-paper-american-college-physicians
- 2017: Joined in formation of Medical Society Consortium on Climate and Health
- Climate Toolkit

Climate Change Poses Risks and <u>Opportunities</u> Related to Health

- The 2015 Lancet Commission on Climate Change and Health report stated: "The effects of climate change are being felt today, and future projections represent an unacceptably high and potentially catastrophic risk to human health."
- BUT it also underscored that Tackling climate change could be the greatest global health opportunity of the 21st century.

ACP Recommendations

 A global effort is required to reduce anthropogenic greenhouse emissions and address the health impact of climate change. The United States must commit to taking both a leadership and collaborative role in developing, implementing and ensuring the success of such a global effort and in reducing its own contributions to greenhouse emissions. Climate change adaptation strategies must be established and mitigation measures must be adopted.

Addressing Climate Change is a Win-Win Situation

- Fossil fuel combustion is a major source of air pollution, endangering respiratory health
 - Switching to clean energy or reducing consumption can improve the air breathed by children, elderly, people with chronic illness, who are especially vulnerable
- Agriculture industry emits massive amounts of methane and other greenhouse gases
 - Reducing meat consumption in favor of more fruits and vegetables may contribute to a more healthy,
 balanced diet
- Healthy buildings recycled construction materials, encourage use of stairs over elevators, use of natural lighting
 - Less construction-related pollution, improved physical activity from stair use, better mental health from day-lighting. (1)

Advocacy: How to Communicate about Climate Change

When discussing the issue with your colleagues, grand rounds audience, or your community, mention the following key points:

- Climate change is real and human-caused.
- Climate change is bad for us and our community in a number of ways.
 - Localize the issue (if you live in S. Florida, talk about how climate change could worsen flooding, leading to displacement, dampness-related respiratory illness, etc.)
- We need to start taking action now to protect the health of our community's most vulnerable members—including our children, our seniors, people with chronic illnesses, and the poor—because our climate is already changing and people are already being harmed.
- Taking action creates a "win-win" situation for us because, in addition to dealing with climate change, most of these actions will benefit our health too.
 - For example, walking or biking instead of driving short distances could reduce the risk of cardiovascular disease as well as reduce greenhouse gas emissions.



More Resources

- Intergovernmental Panel on Climate Change (IPCC) http://www.ipcc.ch/
- U.S. Global Change Research Program http://www.globalchange.gov/
- Health Care without Harm (U.S./Canada) https://climatecouncil.noharm.org/
- My Green Doctor http://www.mygreendoctor.org/
- Medical Society Consortium on Climate and Health <u>https://medsocietiesforclimatehealth.org/</u>
- U.S. Green Building Council http://www.usgbc.org/
- Energy Star https://www.energystar.gov/

Medical Society Consortium on Climate and Health

- ► Formed 2017
- Over 25 physician organizations are members, including ACP
- Goal is to organize and amplify physicians' voice regarding climate change
- https://medsocietiesforclimatehealth.org/

Comparison of Carbon Tax Bills

- Energy Innovation and Carbon Dividend Act
- Climate Action Rebate Act
- Raise Wages, Cut Carbon Act
- Stemming Warming and Augmenting Pay (SWAP) Act
- America Wins Act

Comparison of Carbon Tax Bills

Title	Energy Innovation & Carbon Dividend Act		Climate Action Rebate Act		Raise Wages, Cut Carbon Act		SWAP Act		America Wins Act	
CARBON PRICING DESIGN										
Starting price, \$/mt CO ₂ e	\$15		\$15		\$44		\$30		\$52	
Annual increase, \$/mt CO ₂ e	+ \$10 + CPI		+ \$15 + CPI		+ 2.5% + CPI		+ 5% + CPI		+ 6% + CPI	
Missed-targets increase	+ \$5		+ \$15				+ \$3 @ 2 years			
F-gases taxed	Yes, 10% of GWP		Yes, 20% of GWP		Yes, 10% of GWP		Uncertain		No	
CCUS credits/refunds	Yes (fossil only)		Yes		Yes (fossil only)		Yes (fossil only)		Partial	
EMISSIONS REDUCTION	Target	Model	Target	Model	Target	Model	Target	Model	Target	Model
10 years 15 years	37% 56%	52% 60%	59% 71%	58% 67%	None 	41% 45%	36% 	39% 45%	None 	~39%
30 years	89%		100%							

THE WALL STREET JOURNAL.

▶THURSDAY, JANUARY 17, 2019

▶ Original Co-Signatories Include (full list on reverse):

- 4 Former Chairs of the Federal Reserve (All)
- **27** Nobel Laureate Economists
- 15 Former Chairs of the Council of Economic Advisers
- 2 Former Secretaries of the U.S. Department of Treasury

Economists' Statement on Carbon Dividends

- ▶Global climate change is a serious problem calling for immediate national action. Guided by sound economic principles, we are united in the following policy recommendations.
- I A carbon tax offers the most costeffective lever to reduce carbon
 emissions at the scale and speed that is
 necessary. By correcting a well-known market
 failure, a carbon tax will send a powerful price
 signal that harnesses the invisible hand of the
 marketplace to steer economic actors towards a
 low-carbon future.
- Variable A carbon tax should increase every year until emissions reductions goals are met and be revenue neutral to avoid debates over the size of government. A consistently rising carbon price will encourage technological innovation and large-scale infrastructure development. It will also accelerate the diffusion of carbon-efficient goods and services.
- A sufficiently robust and gradually rising carbon tax will replace the need

- for various carbon regulations that are less efficient. Substituting a price signal for cumbersome regulations will promote economic growth and provide the regulatory certainty companies need for long- term investment in clean-energy alternatives.
- To prevent carbon leakage and to protect U.S. competitiveness, a border carbon adjustment system should be established. This system would enhance the competitiveness of American firms that are more energy-efficient than their global competitors. It would also create an incentive for other nations to adopt similar carbon pricing.

▶ revenue should be returned directly to U.S. citizens through equal lump-sum rebates. The majority of American families, including the most vulnerable, will benefit financially by receiving more in "carbon dividends" than they pay in increased energy prices.

Montana Actions & Organiztions

- Institute of Ecosystems, author of MCA, working on MCA: Health Impacts
- Montana Health Professionals for Healthy Climate (MtHPHC): https://www.montanahphc.org
- Climate Smart Missoula: https://www.missoulaclimate.org/
- Climate Smart Montana
- ► Faith, Science and Climate Action (FSCA): starting Montana Interfaith Power & Light

Individual Actions

Climate Strike: www.strikewithus.org

globalclimatestrike.net

- Medical excuse: https://forms.gle/xzk6tSSr79QnBdRd6
- Sign Call to Action on Climate, Health and Equity: <u>climatehealthaction.org</u>
- ▶ Join an organization: Medical Society Consortium, MtHPHC
- ▶ LTE's, Op-eds
- Call your elected officials, legislators, Members of Congress
- ▶ Talk to friends, family, patients

Medical Excuse

Dear Teachers,

Please excuse your students from regularly scheduled school activities on September 20, 2019 for the Global Climate Strike. Their absence is necessary because of the climate crisis.

As health and medical professionals, we know climate change is a global health emergency that is already causing widespread harm to people's health and wellbeing.

Students around the world are asserting their right to inherit a livable planet, and we stand with them in this fight.

Your students may return to school when the climate strike is over. However, if meaningful action isn't taken soon, we excuse your students to strike again on another Friday in the near future.

Sincerely,