Catalyzing Change: How State Medicaid Agencies Can Lead Health Care to Reduce Harmful Greenhouse Gas Emissions

Introduction

Climate change—driven by a rise in global temperatures from greenhouse gas emissions—affects all parts of the United States. Yet the health burdens of climate change fall disproportionately on people with lower incomes, young children, older adults, people from racial and ethnic minority groups, and Indigenous Americans.[1] Many public agencies and health associations have named climate change the top threat to human health in this century. Climate change strains the health system, threatens community safety, and raises health care costs.

There is an emerging landscape of national and state legislation, policies, and programs focused on protecting health and reducing harm to communities through mitigation and decarbonization (that is, reducing harmful greenhouse gas emissions). And a growing amount of federal and philanthropic funding is available to support decarbonization efforts, including in the health care sector. States that leverage federal support to plan and act now will be better able to lead on protecting health through decarbonization.

The health care sector is responsible for about 9 percent of harmful carbon emissions in the United States.[2] State Medicaid agencies, because of their purchasing power and regulatory authority in the health care sector, are well positioned to be leaders in climate change harm reduction. Mathematica is working with the Commonwealth Fund to inspire, inform, catalyze, and equip state Medicaid agencies to become leaders in reducing the amount of greenhouse gases the health system generates. Mathematica synthesized findings from a rapid landscape scan of existing state policies and interviews with state health care leaders. Informed by those findings, this brief highlights policy tools that state Medicaid agencies may consider and implement to act on climate change mitigation and safeguard the health of their beneficiaries. The brief also establishes a decision making framework that supports state agencies as they consider opportunities in their own states.

Initiating Action on Reducing Harmful Greenhouse Gas Production

States play a critical role in addressing climate change, and climate leaders at the state level have laid the groundwork for national climate policies in many areas over time, including addressing pollution and emissions standards.[3] Similarly, state-based innovation is inherent to the Medicaid program: state Medicaid agencies are governed by federal and state regulations, and states regularly take advantage of flexibilities in the program to better serve the health needs of their beneficiaries. This state-driven action has resulted in innovative ways to address spiraling health costs, the needed shift to value-based payment, and health-related social needs. Climate change, a major social determinant of health, presents another opportunity for state Medicaid agencies to innovate and protect the health of beneficiaries. State Medicaid agencies should consider the following strategies to act on climate change, safeguard the health of their Medicaid beneficiaries, and potentially confer benefits to other economic sectors in the state.

Accelerating Action to Reduce the Harm Caused by Health Care

Leverage existing partnerships and consider new partnerships to align with state regulations and begin to mitigate climate change. State Medicaid agencies might consider partnering with other state agencies to reduce harmful greenhouse gas production through mitigation and decarbonization strategies. For example, state Medicaid agencies can leverage existing partnerships with organizations such as public health departments, other social and human services departments, and environmental regulatory agencies. These partnerships can help by coordinating data analyses, policy development, and expertise in regional impacts of climate change. In one example, states implementing clean buildings standards also regulate health care facilities from their public health departments, which are subsequently reimbursed by Medicaid agencies. Collaborating across agencies can lead to a more effective, coordinated strategy that allows providers to navigate complex regulations with greater ease.

Develop a Medicaid agency climate action plan addressing agency-specific services (for example, consider ways to more sustainably deliver medical and health-related social needs services provided to beneficiaries) and agency-specific needs (for example, the effects of climate-related risks on agency operations, buildings, and procurement agreements). Climate action plans can document, measure, and track greenhouse gas emissions and set reduction targets. Action plans can range from a preliminary establishment of core priorities to a comprehensive plan involving detailed timelines and work plans. Agencies might start small and build the thoroughness of a plan gradually through incremental steps. A little bit of action planning is better than none at all. A growing number of managed care organizations (MCOs) are implementing climate action plans. State Medicaid agencies should consider building on these efforts through simple initial steps that, at first, just align and coordinate with existing efforts. The most important plan elements are the ones that ensure equity across communities and opportunities to streamline data submission with existing processes and infrastructure.

State Medicaid agencies can strengthen their climate action plans by aligning them with guidelines or recommendations from state regulations. For example, in 2020, Washington State created a State Efficiency and Environmental Performance Office, and it passed the Clean Energy Transformation Act in 2019. Climate action plans can also serve to evaluate the potential for Impact Purchasing Commitments, energy partnerships, and committing to the Health Sector Climate Pledge from the U.S. Department of Health & Human Services. Organizations can commit to emission reduction targets and climate resilience goals through this pledge by completing a form and sending it to the Office of Climate Change and Health Equity.[4]

Special consideration should also be given to supporting and coordinating with Indigenous American groups that receive assistance through Medicaid agencies. Indigenous American groups have become leaders of the climate change response movement. In Washington State, for example, the Swinomish tribe, Jamestown S'Klallam Tribe, Yakama Nation, Lummi Nation, and others have created climate action plans that outline their mitigation efforts, which include reducing energy use by tribal governments and reducing emissions from transportation.[5]

Leverage existing Centers for Medicare & Medicaid Services (CMS) flexibilities and payer-specific payment mechanisms to require or incentivize mitigation and decarbonization. State Medicaid agencies can review existing policies and reevaluate their standards for MCOs, health systems, providers, and downstream entities (for example, individual hospitals within health systems) and encourage contracted partners to decarbonize.

Medicaid waivers, including section 1115 demonstrations and section 1915 waivers, allow states, with CMS approval, some flexibility in their health care delivery system. States can consider applying for new, or amending existing, waivers to obtain approval for infrastructure development[i] (that is, technology, workforce development, business, or operational practice development) or payment mechanisms to advance mitigation goals. Washington State has 1115 demonstrations that could indirectly support reduced greenhouse gas use for transportation to care facilities. For example, under the state's 1115 demonstration, CMS granted Washington the authority to deliver long-term care services and supports in allowable alternative settings and to pay higher rates for home and community-based services.[6] Although the approval letter does not specifically mention telehealth services, it is possible that expanding the authority to provide long-term care services and supports could increase the use of telehealth, reducing harmful greenhouse gas emissions used on patient and provider transportation related to these services and supports. From 2015 to 2020, Kaiser Permanente Northwest, a health care organization in Oregon and Washington, saw a 51 percent decrease in patient transportation emissions with increased telemedicine offerings in outpatient clinics.[7]

Medicaid agencies can also leverage mechanisms such as value-based payment, "in lieu of" services, and value-added services to encourage services and investments in climate change mitigation. Agencies could provide incentives for energy assessments; purchase of efficient equipment; and investments in high efficiency building systems, renewable energy, electric vehicles, and water audits in MCOs and health care facilities. For example, the Washington State Health Care Authority, Washington's state Medicaid agency, administers the Washington Medicaid Quality Incentive program, which incorporates climate change into Medicaid quality incentives and measurement. The program includes a survey that relates climate change as part of the required measures to receive incentive payments.[8] There could be opportunities for other Medicaid agencies to incorporate similar programs in their states and incentivize managed care plans to invest in energy or water audits through contracts, value-based payment models, and performance monitoring.

CMS Mechanisms	Definition
Value-based payment	Value-based payment include "models that range from rewarding for performance in fee-for-service (FFS) to capitation, including alternative payment models and comprehensive population-based payments."[9] The models support CMS's aim of better care for individuals, better health for populations, and lower health care costs.
"In lieu of" services	"In lieu of" services "help states offer alternative benefits that take aim at a range of unmet health-related social needs, such as housing instability and food insecurity, to help enrollees maintain their coverage and to improve their health outcomes."[10]
Value-added services	Value-added services are "additional services outside of the Medicaid benefit package (i.e., State Plan and/or Medicaid managed care contract) that are delivered at managed care plans' discretion and are not included in capitation rate calculations."[11]

Provide education and technical assistance to create a common language and shared understanding of the harm-reducing benefits of mitigation initiatives. Providing education resources and technical assistance to all MCOs, health systems, providers, community health workers, and beneficiaries will advance equity and strengthen goals related to (1) broadening the understanding of how to reduce harm through mitigation, (2) establishing a common language, and (3) communicating allowable mitigation initiatives under state Medicaid authority. Education and engagement across all facets of health care are

[i] States might not be able to use funding for capital investments or construction costs.

critical to advance decarbonization initiatives and develop common health and climate literacy. Health care providers and clinical and health care staff at all levels can help reduce harmful emissions. Some example educational initiatives on decarbonization include encouraging plant-forward and healthy eating options for beneficiaries, reducing paper waste, adopting a life-stages approach to communication about climate change, and helping transportation brokers comply with clean fuel standards and other state-specific regulations.

Graduate medical education supports formal and specialty medical education for those in residency or fellowship programs. According to the *American Journal of Surgery*, Medicaid was the second largest contributor to graduate medical education funding in 2018, with about $5.58 billion provided via state funding and federal matching.[12] There might also be opportunities for Medicaid to incentivize education programs to incorporate climate change content for residents, fellows, and hospital staff on the importance of mitigation initiatives to reduce harm. Doing so would further engage them in sustainable health care practices and develop a common vocabulary, which can be shared with all beneficiaries.

Summary of Policy Tools

Policy Tool	Description	Implementation Example
Leverage existing partnerships and consider new partnerships to align with state regulations and identify ways to reduce the health care sector's production of harmful greenhouse gases.	State Medicaid agencies can leverage partnerships with other state agencies, community organizations, and private sector organizations to reduce harm by promoting mitigation and decarbonization.	Partnering with state initiatives and offices, such as the State Efficiency and Environmental Performance Office in Washington State, is one way for state Medicaid agencies to strengthen their response to climate change and accelerate its efforts with existing state regulations.
Develop a Medicaid agency climate action plan that outlines agency-specific services (for example, consider ways to more sustainably deliver medical and health-related social needs services provided to beneficiaries), and agency-specific needs (for example, the effects of climate-related risks on agency operations, buildings, and procurement agreements). Planning efforts can range from preliminary to thorough.	Climate action plans are used to document, measure, and track greenhouse gas emissions and set reduction targets. State Medicaid agencies can consider integrating or reviewing existing plans among partners and align their own plans with guidelines or recommendations from state regulations.	The Swinomish tribe, Jamestown S'Klallam Tribe, Yakama Nation, Lummi Nation, and other Washington State tribes have created climate action plans that outline their mitigation efforts, which include reducing energy use by tribal governments and reducing emissions from transportation.
Leverage existing CMS flexibilities and payer-specific payment mechanisms to require or incentivize the reduction of harmful greenhouse gas production through decarbonization.	States can apply for new, or amend existing, 1115 and section 1915 Medicaid waivers to advance mitigation goals. They can use mechanisms such as value-based payment, "in lieu of" services, and value-added services to encourage services and investments that reduce the production of harmful greenhouse gases.	Washington's Medicaid Quality Incentive program incorporates a survey that includes climate change as part of the required measures to receive incentive payments.

Policy Tool	Description	Implementation Example
Provide education and technical assistance to create a common language and shared understanding of the harm reduction benefits of mitigation initiatives.	Providing education resources and technical assistance to all parts of the health care sector will broaden understanding about mitigation, establish a common climate change language, and clarify allowable mitigation initiatives under state Medicaid authority.	Through graduate medical education, Medicaid might be able to incentivize deployment of climate change curricular content for residents, fellows, and hospital staff covering the importance of reducing the emission of harmful greenhouse gases.

Prioritizing Action

Medicaid agencies and policymakers can use the FITE (feasibility, impact, timeliness, equity) decision making framework to compare and assess solutions and policy approaches to reducing harm through decarbonization.

- **Feasibility** considers the degree to which a given action is under the direct control of the state Medicaid agency, the factors that influence the ease of policy implementation (such as applying for a waiver and amending managed care contracts), and the ease of deploying and financially sustaining the program or service after the policy change is approved.
- **Impact** assesses how significantly the policy would reduce the production of harmful greenhouse gases and the level of priority assigned to the policy target by state Medicaid agencies, state residents, and MCOs. Potential metrics to measure impact include the reach of the policy (that is, number or percentage of health care settings or supply chains a policy affects) and the anticipated reduction in greenhouse gas production (known as the carbon footprint) of health care organizations.
- **Timeliness** considers the anticipated time to implement the policy option and the anticipated time to initial observable impacts and the full desired impact.
- **Equity** accounts for the anticipated impact on historically marginalized populations, level of community engagement, and the extent to which the policy would incorporate voices of community members. For mitigation efforts, this might include the degree to which a recommended option creates opportunities to align, blend, and braid resources to advance the efforts of minority and Indigenous American communities.

Agencies passionate about climate mitigation can use FITE to evaluate and compare their options and generate a ranking of policy responses.

Closing

As climate change continues, the United States will experience greater strains on its health system, threats to community safety, and higher health care costs. State Medicaid agencies can help protect the more than 89 million Medicaid beneficiaries across the United States by motivating the health care sector to reduce the harmful greenhouse gases it produces. This will require creativity and collaboration. The policy considerations provided here give states a foundation to build on as they become leaders and catalyze change.

This brief, authored by Mathematica and supported by the Commonwealth Fund, is part of the *Catalyzing State Medicaid Leadership on Climate Change Mitigation* project. Learn more about this project and related products by visiting www.mathematica.org/projects/catalyzing-state-medicaid-leadership-on-climate-change-mitigation.

Citations

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