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How North Carolina Is Using Medicaid To Address Social Determinants of Health

North Carolina has developed a large-scale, comprehensive approach to addressing unmet nonmedical needs—including food, housing, and transportation insecurity—through Medicaid.

AUTHORS



Nicole Rapfogel



Jill Rosenthal

[Strengthening Health](#), [Health](#), [Social Determinants of Health](#), [+2 More](#)



A view of Charlotte, North Carolina, during the coronavirus pandemic in March 2020. (Getty/Peter Zay/Anadolu Agency)

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Introduction and summary

Medicaid—a joint federal-state partnership that provides health coverage primarily to low-income people and families in America—has been one of the most effective initiatives at improving health and addressing health disparities in the country.¹ Numerous studies have associated Medicaid coverage with better health outcomes and lower mortality rates.² However, experts are increasingly concluding that clinical interventions alone are not sufficient to combat insidious health inequities and give low-income people opportunities to achieve health and well-being.³

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Lower-income people often face social and structural barriers to achieving health, including food and housing insecurity; access to quality education; and access to clean air, land, and water. Intersecting identities such as race, gender, sexual orientation, and immigration status further compound these social needs.⁴ This report considers the health landscape in North Carolina, where many residents have social needs that put them at high risk of health inequities:⁵

- More than 1.2 million North Carolinians are unable to access affordable housing.
- North Carolina has the eighth-highest food insecurity rate among all U.S. states.
- In North Carolina, 1 in 5 North Carolina children live in food-insecure households, and nearly 1 in 4 have had adverse childhood experiences, potentially traumatic events that occur in childhood.⁶
- Nearly 1 in 2 women in North Carolina have experienced intimate partner violence.

To respond to the unmet social needs affecting residents' health, North Carolina has developed a pilot program, the Healthy Opportunities Pilots, to leverage opportunities for flexibility offered by the Centers for Medicare and Medicaid Services (CMS) that allow state governments to use Medicaid dollars to address social determinants of health.⁷ This report provides background on the Medicaid program and considers the merits of the Healthy Opportunities Pilots program.

Background

Medicaid coverage is associated with increased access to care and preventive services, improved health status, decreased hospital and emergency department use, and decreased mortality rates.⁸ Furthermore, the Affordable Care Act's Medicaid expansion, which provided Medicaid coverage to 13 million additional adults, has led to fewer public safety offenses, fewer evictions, and reduced medical debt.⁹

Medicaid is a safety net program that provides flexibility for states

State Medicaid programs offer several flexibility opportunities that allow states to meet the needs of their residents. Section 1115 waivers, for example, allow states to modify Medicaid coverage, payment, and other requirements, which enables them to address a more robust set of needs than traditional clinical care.¹⁰ Contracts with managed care organizations (MCOs) and accountable care organizations (ACOs) also create opportunities for health care payers to coordinate medical and nonmedical services more closely.¹¹ North Carolina was able to leverage a Section 1115 waiver to create a standardized screening initiative, referral platform, and pilot program to link social and medical services and use Medicaid funding to address social determinants of health.¹²

While Medicaid has been a lifeline to improve access to care, especially in the 38 states that have expanded it—of which North Carolina is not one—numerous nonclinical, or social, determinants weigh heavily on health care access and health outcomes. To address whole-person health, states must alter their approaches to target these social and economic factors.

Social determinants of health play a key role in health outcomes and access to services

According to a 2016 article in the *American Journal of Preventive Medicine*, clinical care only accounts for 10 percent to 20 percent of health outcomes.¹³ The remaining components of health include socioeconomic factors, physical environment, genes and biology, and health behaviors.¹⁴ Social determinants of health are the nonclinical factors among these things, such as one's social and community context, education level, neighborhood and environment, health care access, and economic stability.¹⁵ For example, people with more educational attainment are more likely to be healthier and live longer than those with lower educational attainment.¹⁶ Notably, more than 1 in 3 Medicaid enrollees have less than a high school education.¹⁷

Traditional health policies that improve coverage or quality of care often only solve one piece of a complex puzzle; to create meaningful and lasting change and address persistent health inequities, policymakers must also focus on the social and economic factors underlying disparities. Strong evidence confirms the benefits of health care and community-based organizations working together to address social needs that affect health, including significant cost savings and high returns on investment.¹⁸



To create meaningful and lasting change and address persistent health inequities, policymakers must also focus on the social and economic factors underlying disparities.

Many interventions to address the social determinants of health emphasize a focus on individual health-related social needs. For example, a program may offer healthy meal deliveries to someone facing food insecurity or outfit a new air conditioner in an apartment whose resident has asthma. While these interventions are necessary, social determinants of health also operate on a community, structural level.¹⁹ To maximize the benefits of federal spending, policymakers must address both individual and structural social needs in state health care approaches.

North Carolina's Medicaid program

Using a Section 1115 waiver, North Carolina has undertaken a major effort to put Medicaid dollars toward evidence-based interventions to address social determinants of health: the Healthy Opportunities Pilots program.

Healthy Opportunities Pilots program

North Carolina's interventions fall into four domains: food, housing, transportation, and interpersonal violence/toxic stress. The CMS has authorized a significant investment in the Healthy Opportunities Pilots program in two to four regions of the state as well as in robust evaluation: \$650 million over five years.

To qualify for participation in the program, a person needs to meet at least one needs-based criterion and demonstrate at least one social risk factor related to the four intervention domains.²⁰ The needs-based criteria refer to health risk factors including chronic conditions, frequent hospital use, high-risk pregnancies, and adverse childhood experiences. (see text box)

North Carolina Healthy Opportunities Pilots program eligibility factors and services²¹

To qualify for the Healthy Opportunities Pilots program, participants must demonstrate at least one health risk factor and one social risk factor. Pilot services correspond to needs associated with each social risk factor.

Health risk factors:

- Adults with two or more chronic conditions or repeated emergency department use or hospital admissions
- High-risk pregnant women
- Infants and children at high risk or with one or more chronic conditions

Social risk factors and pilot services to address them:

- Homelessness and housing insecurity
 - Pilot services: tenancy support; housing quality and safety; legal referrals; security deposit and first month's rent; and short-term post-hospitalization housing assistance
- Food insecurity
 - Pilot services: food support and meal delivery
- Transportation insecurity
 - Pilot services: nonemergency health-related transportation
- Risk of witnessing or experiencing interpersonal violence
 - Pilot services: interpersonal violence-related transportation, legal referrals, and parent-child supports

Healthy Opportunities Pilots program funds are also used to build capacity, establish network leads, and support human service organizations in delivering social services.²² Network leads are entities with deep community roots that “facilitate collaboration and build partnerships across healthcare payers and human service providers.”²³ One network lead operates in each pilot region. To deliver their services, human service organizations contract with their region's network lead.

Addressing unmet nonclinical needs may confer savings, potentially appeasing state budgetary concerns.²⁴ If the North Carolina program sees savings and/or improved outcomes in any region, it may become much easier for other regions in the state—and other states—to replicate the program. If the pilot program is successful and cost effective, the CMS can decide to expand its duration and scope.

Transition from the fee-for-service model

Prior to launching its Medicaid pilot program, North Carolina began to transition most of its Medicaid beneficiaries from fee-for-service Medicaid to managed care.²⁵ Fee-for-service arrangements pay health care providers for each service performed, while managed care models refer to contracts between Medicaid and managed care organizations (MCOs) that pay an MCO a set capitated payment for services per member per month.²⁶ Value-based purchasing arrangements, which link payments to provider performance and can include MCOs, provide financial flexibility for health care organizations to address social needs.²⁷ Conversely, fee-for-service models are not as well suited to cross-sector collaboration, as they only pay for specific services and may contribute to fragmented health care delivery systems.²⁸

State legislation required North Carolina to contract with 4 to 12 prepaid health plans to deliver managed care across six regions, emphasizing case management and whole-person health.²⁹ Prepaid health plans must provide care management services with network leads to help beneficiaries access human service organizations' nonmedical interventions.³⁰ Managed care plans took effect July 1, 2021.³¹ As of October 2021, nearly 1.7 million North Carolina Medicaid beneficiaries were enrolled in managed care plans—more than two-thirds of Medicaid enrollees in the state.³²

In restructuring its Medicaid program, the North Carolina Department of Health and Human Services (NCDHHS) embedded its screening, referral, and care management systems in its managed care programs.³³ As the state implements and evaluates the program, the NCDHHS intends to increasingly link payments to performance compared with health and cost benchmarks.³⁴ It will initially provide fee-for-service and bundled payments to prepaid health plans, which will pay network leads. Network leads will subsequently use the approved fee schedule to pay human service organizations for delivering Healthy Opportunities Pilots program services. Each year of the demonstration, the NCDHHS is responsible for implementing more comprehensive value-based incentive programs and moving away from fee-for-service payments.

Payment to social service providers

Because Medicaid traditionally pays for clinical health services, North Carolina had to first conduct a robust analysis to determine how to pay for social services. To determine the fee schedule, the NCDHHS “conducted a rigorous and transparent year-long process to develop service definitions, gather data on cost inputs, and identify reference points for pricing when available.”³⁵ It looked at pricing information from 80 organizations, conducted focus groups with North Carolina-based human service organizations, and sought public feedback before submitting the fee schedule to the CMS. The fee schedule clearly describes and prices services. (see Table 1) Payment rates reflect the rate paid to the human service organization that provides the service and include administrative and other costs associated with delivering the service.

Table 1



North Carolina Healthy Opportunities Pilots services fee schedule

Service	Unit of service
<i>Housing</i>	
Inspection for housing safety and quality	Cost-based reimbursement cap
Housing move-in support	Cost-based reimbursement cap
<i>Interpersonal violence (IPV)/toxic stress</i>	
IPV case management services	Per member per month
Home visiting services	One home visit
<i>Food</i>	
Evidence-based group nutrition class	One class
Healthy food box (delivered)	One food box
<i>Transportation</i>	
Reimbursement for health-related public transportation	Cost-based reimbursement cap
Reimbursement for health-related private transportation	Cost-based reimbursement cap

Standardized social need screenings

Using a Section 1115 Medicaid waiver, the NCDHHS created a list of nine standard screening questions for health care providers to determine if patients have unaddressed social needs. The screening tool asks about food, housing and utilities, transportation, and interpersonal safety, with two optional questions about immediate need. Providers can then use the NCCARE360 referral system described below to connect the patient with an organization that provides services or to determine eligibility for the Healthy Opportunities Pilots, if the program is operating in their region.

Connecting health and social services through NCCARE360

NCCARE360 is a statewide resource database and referral platform that connects community-based organizations, social service agencies, and health care providers to address social determinants of health.³⁶ At the point of health care service, providers can use standardized screening questions to determine patients' social and economic needs and connect them with organizations to help.³⁷ The referral system operates as a closed loop so that providers and organizations can track accepted referrals and outcomes for each participant.

+2.2K

Organizations participating in
NCCARE360

+41K

Unique individuals served by
NCCARE360 in 2020

8K

Requests for care coordination
services responded to by
NCCARE360 in 2020

An example beneficiary's experience

Imagine an adult patient with a chronic condition who is admitted to an emergency department.* The patient is treated; at the point of service, the health care provider asks the standardized screening questions. The patient answers “Yes” to the question: “Within the past 12 months, did you worry that your food would run out before you got money to buy more?” This affirmative response prompts the hospital to identify the patient as food insecure. If the patient does not live in one of the pilot regions or does not qualify for pilot services, the provider can connect them to food banks, nutrition coaching, and other food security services through NCCARE360. The provider can then track the referral to see if it was accepted by the receiving organization and if the patient accessed the help they needed.

If the patient does live in a Healthy Opportunities Pilots region and has a nutrition-related chronic condition, the provider can use NCCARE360 to refer the patient for pilot services. For example, if the patient is unable to purchase healthy foods or access a food distribution site, they can receive delivered healthy food boxes at no cost. The registered dietician, box packaging staff, and delivery staff would be reimbursed for their services through Medicaid, as would the cost of the food.

* This text box builds on examples given by Zachary Wortman, chief of staff at the NCDHHS; Elizabeth Cuervo Tilson, state health director and chief medical officer at the NCDHHS; and Mandy Krauthamer Cohen, former secretary of the NCDHHS, in their 2020 Health Affairs article.³⁸

Funding

A key component of North Carolina’s Medicaid approach is its funding mechanism. By using a Section 1115 waiver, North Carolina received \$650 million over five years in federal Medicaid funds to support its endeavor to connect patients to social services, \$100 million of which can be used for capacity building. Critically, while waivers typically require budget neutrality, pilot services are considered “hypothetical,” in that the CMS assumes this spending would be permissible for federal funding in other parts of the Medicaid program, thereby waiving the budget neutrality component.³⁹ The waived budget neutrality clauses contain exceptions for certain waiver populations and programs, such as aged, blind, and disabled beneficiaries and enhanced case management services.⁴⁰ North Carolina bears the risk for per capita costs of demonstration but not the risk for demonstration population size, which can change drastically depending on economic conditions.⁴¹

Implementation

The NCCARE360 platform has accrued a substantial number of participants since it launched in select North Carolina counties in May 2019.⁴² The innovative platform is now functional in all 100 counties, with more than 2,200 organizations participating.⁴³ Medicaid MCOs are required to participate in NCCARE360 once it is operating in their counties. Due to hospital consolidation, much of the market is concentrated, meaning that once a few health systems join NCCARE360, much of the service area may be covered.⁴⁴ For example, Duke Health,⁴⁵ UNC Health,⁴⁶ and WakeMed⁴⁷ have all adopted NCCARE360—and accrue 30.5 percent, 28.0 percent, and 24.5 percent of their primary service areas, respectively, primarily in the Research Triangle area (i.e., Durham, Chapel Hill, and Raleigh).⁴⁸

Lessons learned from the COVID-19 Support Services Program

While the Healthy Opportunities Pilots program is only beginning to launch its service provision components, North Carolina learned some important lessons in 2020 through its Support Services Program (SSP), which offered food and financial assistance to people in select “hot spot” counties that were quarantining, isolating, or sheltering in place due to COVID-19 exposure or risk.⁴⁹ Using the NCCARE360 referral platform and paired with a newly developed Community Health Worker program, the SSP partnered with local community-based organizations to deliver food to eligible individuals’ homes and provided financial supports to struggling residents.⁵⁰ The SSP used a combination of Coronavirus Aid, Relief, and Economic Security (CARES) Act and state funding to provide technical assistance and deliver these services.⁵¹

While temporary, the SSP was one initiative embedded in a broader “ecosystem of support.”⁵² The NCDHHS used feedback and metrics for individual components of the SSP to improve programs across the ecosystem.⁵³ For example, the SSP allowed the NCDHHS to develop infrastructure and address challenges with reimbursement, technology access, language accessibility, and diverse population reach that will ultimately aid smoother rollout of Healthy Opportunities Pilots program services.⁵⁴

The NCDHHS has already begun to make midcourse adjustments. In response to the limited initial uptake of the NCCARE360 platform, the NCDHHS changed the service from a pay-per-license structure to a flat fee for unlimited use charged to large health systems and payers.⁵⁵ Social service and community organizations do not pay to participate. Community organizations that receive referrals initially faced a referral acceptance rate of 56 percent, due in part to the referring organization’s limited understanding of eligibility criteria for services requested.⁵⁶ Nonetheless, in 2020, NCCARE360 served more than 41,000 unique individuals, up from 1,200 in the year prior.⁵⁷

By spring 2022, the Healthy Opportunities Pilots program is expected to be operating in three regions of the state: one in western North Carolina, led by Impact Health (Dogwood Health Trust); the second in southern North Carolina, led by Community Care of the Lower Cape Fear; and a third in eastern-central North Carolina, led by Access East Inc.⁵⁸ (see Figure 1)

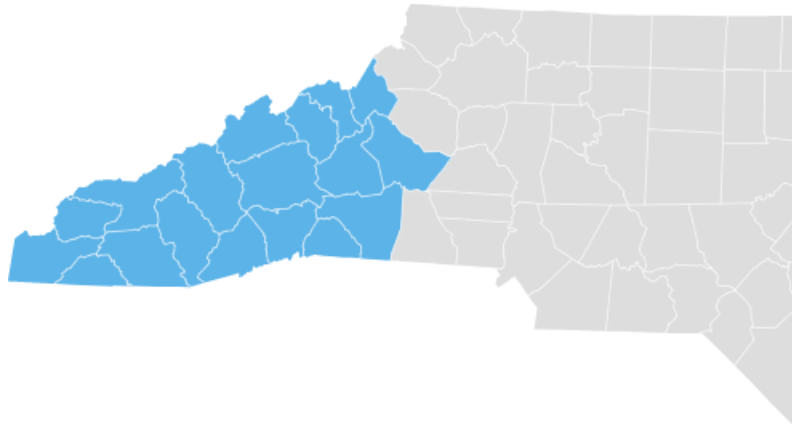
Figure 1



North Carolina Healthy Opportunities Pil program network lead organizations, co and population size

Access East Inc.
Health

Community Care of the Lower Cape Fear



Hover or click to see more info.

Map: Center for American Progress • Source: North Carolina Department of Health Services, "DHHS Announces Three Regions for Medicaid Healthy Opportunities Pilot Milestone for Nation's First Comprehensive Medicaid Program to Address Non-Me Health" Press release, May 27, 2021, available at <https://www.ncdhhs.gov/news/r>

Evaluation criteria

The NCDHHS will evaluate the pilot program rigorously. Its key learning objectives include evaluating how effective the pilot program is at improving health outcomes and lowering health care costs, leveraging evaluation findings to sustain cost-effective interventions in the Medicaid program, and supporting the sustainability and capacity of delivering nonmedical services.⁵⁹ More specifically, to evaluate cost savings, the NCDHHS will calculate total expenditures to Medicaid, out-of-pocket costs for Medicaid enrollees, and costs of Medicaid-funded services and components.⁶⁰ The NCDHHS anticipates effective delivery of pilot services, increased screenings for social risk factors, more connections to social services, decreased social risk factors, improved health care outcomes, and lower health care costs.⁶¹ Evaluations will occur in real time to make any midcourse adjustments and improve the delivery of effective services, and to inform a summative evaluation to assess the global impact of the pilot program.⁶²

Cost savings associated with



addressing social needs

Addressing the social determinants of health not only improves equity of care, but it can also result in savings. Investing in the nonclinical factors that are critical determinants of a person's health status can reduce costs by preventing poorer health outcomes, lowering the number of hospital admissions and readmissions, and mitigating the emergency care needed to address acute health crises. For example, a Massachusetts program that coordinates social services for patients with chronic conditions and disabilities resulted in 55 percent fewer hospital days per 1,000 members than those incurred by comparable patients who did not access services.⁶³ Furthermore, researchers estimated that one community health worker intervention would result in a \$2.47 return on every dollar invested.⁶⁴ A social service referral program operating in 14 states resulted in 10 percent fewer expenditures for a group that reported met social needs, compared with a group that did not have their social needs met.⁶⁵ While the Healthy Opportunities Pilots program has not yet produced enough evidence to determine actual cost savings, many North Carolina initiatives previously conducted in the Healthy Opportunities Pilots program's four domains—interpersonal violence and toxic stress, housing, food, and transportation—have proved cost effective.

The NCDHHS anticipates effective delivery of pilot services, increased screenings for social risk factors, more connections to social services, decreased social risk factors, improved health care outcomes, and lower health care costs.

Interpersonal violence and toxic stress

Much evidence demonstrates the economic value of addressing interpersonal violence and toxic stress in health care. One 2011 study found that the per-woman costs associated with ongoing domestic violence were more than \$13,000 per year—about \$16,000 today in 2021 purchasing power.⁶⁶ A 2012 study of quality interpersonal violence prevention and intervention programs in Alberta, Canada, estimated significant cost savings: There was as much as a 600 percent return on investment.⁶⁷ A recent systematic review found that, among 10 studies that conducted cost-benefit analyses of violence intervention programs, all studies reported positive cost-benefit ratios.⁶⁸ Furthermore, another study estimated cost savings from hospital-based violence intervention programs ranging from nearly \$83,000 to more than \$4 million,⁶⁹ and an additional study found that hospital-based violence intervention programs could save state Medicaid programs \$69 million annually among the Medicaid expansion population.⁷⁰

Housing

Housing initiatives can confer significant savings. A homeless medical respite pilot program in the southeastern United States resulted in a nearly 50 percent reduction in health care charges compared with the previous year.⁷¹ One hospital in North Carolina started a program to connect homeless patients with housing resources that resulted in a 42 percent to 61 percent decrease in health care costs of participants and a 35 percent decrease in emergency department use.⁷²

Food

Addressing malnutrition can also result in cost savings. One Chicago-based accountable care organization created a malnutrition screening initiative and supplemental nutrition program that resulted in \$3,800 in net savings per patient, totaling nearly \$5 million.⁷³ One early nutrition therapy initiative in Colombia resulted in a near 36 percent decrease in costs, resulting from lower hospital costs, reduced readmission rates, and fewer complications.⁷⁴

Transportation

Transportation is key to patients' ability to access medical care and can result in additional cost savings. A 2019 study modeled the economic benefit of nonemergency medical transportation initiatives via digital transportation networks, including ride-sharing platforms such as Uber and Lyft, for transportation-disadvantaged Medicaid beneficiaries and estimated net savings between \$4.3 billion and \$4.8 billion.⁷⁵ Furthermore, a 2018 study of return on investment associated with nonemergency medical transportation for people receiving dialysis treatments, accessing diabetes-related wound care, and seeking substance use disorder care found an average return on investment of \$1,335 per member per month.⁷⁶

Takeaways for other states

North Carolina's innovative Healthy Opportunities Pilots program raises important considerations for other states considering developing more robust programs to address social determinants of health. Following North Carolina's lead, states can use federal Medicaid funds to alleviate budgetary concerns, build on existing coordinated care efforts and community ties, and develop programs for maximal impact.

Leverage federal Medicaid dollars

Leveraging federal Medicaid funds can mitigate some state budgetary constraints. Addressing social determinants of health may require significant upfront investment; because social determinant of health initiatives seek to address structural lack of access and inequities, it may take some time to begin to achieve savings. Leveraging federal funding to implement these programs may help states sustain them long enough to have a substantial impact. The Healthy Opportunities Pilots program will evaluate total expenditures to Medicaid, out-of-pocket costs to Medicaid enrollees, and costs of Medicaid-funded services and components to help determine if the program results in cost savings.⁷⁷

North Carolina's Section 1115 waiver provides \$650 million in federal funding and reserves \$100 million in funding for capacity building. North Carolina uses Medicaid funds to pay for services, incentivize quality, and absorb the administrative costs of implementation. To begin, the NCDHHS sends funds to prepaid health plans, which then flow to network leads to reach human service organizations at the price outlined in the fee schedule.⁷⁸ Because this funding is initially operating under a fee-for-service or bundled payment model, North Carolina can gather the data needed to determine and transition to value-based payments.⁷⁹

Build on coordinated care efforts

North Carolina's first step toward treating whole-person health and addressing social needs was to commit to transitioning away from a fee-for-service Medicaid model. Several value-based payment models are conducive to paying

for social services, including capitation, global budgets, and ACOs.⁸⁰ The North Carolina General Assembly passed legislation in 2015 directing the NCDHHS to transition Medicaid from fee-for-service to managed care.⁸¹ Most Medicaid beneficiaries began transitioning to managed care on July 1, 2021.⁸² By paying plans a monthly rate per member to provide care, North Carolina's Medicaid program enables them to include nonmedical services in their covered services.

However, North Carolina was careful not to take on more change than it could manage. The state built on its existing fee-for-service infrastructure to develop a fee schedule for payments to human service organizations. By beginning with the existing structure but embedding specific requirements to transition to a value-based payment model, North Carolina did not venture into impossibly ambitious territory. Instead, the state recognized its starting conditions and mapped out a concrete plan that built on that infrastructure. As other states consider robust reform, they should note this important lesson.

Critically, many states have already implemented value-based payment models upon which they can build: 69 percent of Medicaid beneficiaries nationally are enrolled in managed care.⁸³ Only four states—Alaska, Connecticut, Vermont, and Wyoming—use fee-for-service Medicaid models exclusively.⁸⁴ Furthermore, 24 states screen Medicaid enrollees for social needs, and 28 states refer enrollees to social services.⁸⁵ In a 2019 survey by the Institute for Medicaid Innovation, all surveyed managed care organizations offered coverage for some social determinant of health activities for some enrollees.⁸⁶

However, few states currently address social needs to the extent that North Carolina does: Just 11 states use standardized screening questions, and only five states track the outcome of referrals. The states that already operate value-based payments may have the infrastructure needed to more easily develop more robust social needs programs.

What are other states doing?

While North Carolina's approach is a significant advancement, several other states are also making headway in addressing nonmedical needs through Medicaid. Eighteen states and Washington, D.C., "have taken at least foundational steps toward statewide VBP [value-based payment] initiatives that directly address SDoH [social determinants of health] needs."⁸⁷ Yet only a few states specify payment reform or funding for activities that address social determinants of health.⁸⁸ For example, Oregon's coordinated care organizations (CCOs), networks of providers who work together to serve Medicaid beneficiaries,⁸⁹ are required in their contracts to make investments in "health-related services" (HRS) to provide support for social determinants of health.⁹⁰ This HRS spending can count toward the CCOs' medical loss ratio—a required proportion of spending on health care services and quality improving activities and an element that states can also integrate into their managed care contracts.⁹¹ Oregon legislation passed in 2018 requires CCOs to "spend earnings above specified threshold on services designed to address health disparities and social determinants of health."⁹² The CCO model resulted in a 7 percent reduction in health care expenditures, fewer avoidable emergency department visits, and improvements in quality measures.⁹³

In Massachusetts, ACOs implemented a screening process and contracted with community-based organizations to provide nonmedical services to Medicaid beneficiaries.⁹⁴ Massachusetts uses a

Section 1115 Medicaid waiver to apply federal funds to social services and implemented a pay-for-performance shared savings program using screening quality measures.⁹⁵ Minnesota and Rhode Island operate similar programs: Minnesota's Integrated Health Partnerships program uses capitated population-based payments and performance metrics to target social needs, while Rhode Island's Accountable Entities and managed care programs use value-based payments and shared saving incentives to prioritize whole-person care.⁹⁶

Washington state created its Accountable Communities of Health (ACHs) program through a Section 1115 waiver. ACHs are independent, regional organizations that work with community partners to improve the health of local populations through delivery system reforms, care coordination, and community investments.⁹⁷ ACHs have decision-making bodies that include health care partners, community partners, and community-based organizations that provide social services.⁹⁸ ACHs offered significant funding for this program: nearly \$1 billion over five years, ending December 2021, for performance-based incentive payments to providers and "managed care organizations (MCOs) that support delivery system transformation efforts."⁹⁹ Washington is pursuing a one-year amendment and extension of its ACH program.¹⁰⁰

Similarly, in March 2021, Pennsylvania launched its Regional Accountable Health Councils (RAHCs) program, akin to Washington's ACHs.¹⁰¹ Each of the five RAHCs, established by the MCOs and behavioral health primary contractors in each region, will include managed care payers, providers, and community-based organizations.¹⁰² RAHCs aim to address health inequities and disparities; identify and address social determinant of health needs; and promote value-based purchasing and care integration, all with an emphasis on the communities most in need.¹⁰³

Build on existing community resources and relationships

While understanding health through a whole-person lens that integrates social and economic factors is crucial to addressing health disparities and improving outcomes, the North Carolina Medicaid approach maintains an important distinction between health care providers and payers and human service organizations. In addressing social determinants of health and linking social services to health care, health care providers and payers should not attempt to recreate social service infrastructure.¹⁰⁴ Also key is acknowledging power imbalances that arise from this partnership and building genuine cross-sectional relationships early in the process.¹⁰⁵

By creating infrastructure and incentives for payers and providers to refer patients to human service organizations that are already established and trusted in local communities, health care and social service providers can collaborate without sacrificing quality or expertise. Furthermore, since 27 state Medicaid programs currently partner with community-based organizations and social service providers in their managed care contracts, states can leverage those existing partnerships to follow in North Carolina's footsteps with an expanded program.¹⁰⁶ Finally, an important element of North Carolina's approach is using federal funds to support human service organizations in building capacity to offset increased demand.¹⁰⁷ For example, North Carolina has provided technical assistance and education to human service organizations to build capacity for

billing, identifying insurance status, and other processes.¹⁰⁸ This is an approach other states should consider as they expand into addressing social needs.

Develop infrastructure for data collection and sharing

North Carolina's NCCARE360 referral system, developed through its Section 1115 waiver, is a critical element of programming to address social determinants of health. North Carolina developed a set of standardized screening questions that help facilitate consistent data entry. The state designed NCCARE360 to offer bidirectional information sharing among health care providers, payers, and human service organizations. The state also provided key support by integrating NC 211, an around-the-clock confidential information and referral service that provides navigators who offer users oversight and technical assistance with NCCARE360.¹⁰⁹ Users can submit navigator requests directly on the NCCARE360 platform.¹¹⁰ In 2020, NCCARE360 navigators responded to nearly 8,000 requests for care coordination services.¹¹¹

One critical element of data sharing that states must consider early in the process is privacy protections for shared data. While health data are protected by the Health Insurance Portability and Accountability Act, other social determinant information may be subject to other privacy protections. For example, some education data are protected by the Family Educational Rights and Privacy Act. States should consider their approaches to data collection, sharing, and storage mechanisms in the early stages of integrating unmet social needs into health care experiences.¹¹²

Think big

North Carolina's Medicaid approach to addressing social needs is a prime example of large-scale, innovative thinking. It was a multistep process that created several levels of infrastructure to be able to carry out social need referrals and services with hundreds of millions of dollars in federal funding. As other states seek to apply a similar model, they should think critically about their own context and the large-scale operations they can develop for meaningful change. Furthermore, while addressing individual nonmedical needs is critical, states should consider how to extend these programs to address social needs on a structural level.

Conclusion

North Carolina's Healthy Opportunities Pilots program is an innovative approach, as are the state's other programs to address unmet social needs through Medicaid. Integrating a standardized screening process, referral and feedback system, and enhanced programming for at-risk individuals within the Medicaid program leverages federal funding and builds on existing infrastructure. Other states seeking to improve health outcomes and reduce health disparities should take note of North Carolina's programming, consider making similarly wise investments, and monitor its evaluation closely.

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Endnotes

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- 1 U.S. Department of Health and Human Services, “Who is eligible for Medicaid?”, available at <https://www.hhs.gov/answers/medicare-and-medicaid/who-is-eligible-for-medicaid/index.html> (last accessed November 2021); Emily Gee and Nicole Rapfogel, “Closing the Medicaid Coverage Gap Would Save 7,000 Lives Each Year,” Center for American Progress, September 10, 2021, available at <https://www.americanprogress.org/issues/healthcare/news/2021/09/10/503687/closing-medicaid-coverage-gap-save-7000-lives-year/>.
- 2 U.S. Department of Health and Human Services, “Who is eligible for Medicaid?”; Manatt, Phelps and Phillips LLP, “Medicaid’s Impact on Health Care Access, Outcomes and State Economies” (New York: Robert Wood Johnson Foundation, 2019), available at <https://www.rwjf.org/en/library/research/2019/02/medicaid-s-impact-on-health-care-access-outcomes-and-state-economies.html>; Center on Budget and Policy Priorities, “Chart Book: The Far-Reaching Benefits of the Affordable Care Act’s Medicaid Expansion” (Washington: 2020), available at <https://www.cbpp.org/research/health/chart-book-the-far-reaching-benefits-of-the-affordable-care-acts-medicaid-expansion>.
- 3 North Carolina Department of Health and Human Services, “About Healthy Opportunities,” available at <https://www.ncdhhs.gov/about/department-initiatives/healthy-opportunities/about-healthy-opportunities> (last accessed November 2021).
- 4 Steven Woolf, “Social and Economic Policies Can Help Reverse Americans’ Declining Health” (Washington: Center for American Progress, 2021), available at <https://www.americanprogress.org/issues/healthcare/reports/2021/10/07/506171/social-economic-policies-can-help-reverse-americans-declining-health/>.
- 5 North Carolina Department of Health and Human Services, “About Healthy Opportunities.”
- 6 Centers for Disease Control and Prevention, “Preventing Adverse Childhood Experiences,” available at <https://www.cdc.gov/violenceprevention/aces/fastfact.html> (last accessed January 2022).
- 7 North Carolina Department of Health and Human Services, “About Healthy Opportunities.”
- 8 Manatt, Phelps and Phillips LLP, “Medicaid’s Impact on Health Care Access, Outcomes and State Economies.”
- 9 Gee and Rapfogel, “Closing the Medicaid Coverage Gap Would Save 7,000 Lives Each Year.”
- 10 Hannah L. Crook and others, “How Are Payment Reforms Addressing Social Determinants of Health? Policy Implications and Next Steps” (Washington: Duke-Margolis Center for Health Policy, 2021), available at https://www.milbank.org/wp-content/uploads/2021/02/Duke-SDOH-and-VBP-Issue-Brief_v3-1.pdf.
- 11 Ibid.
- 12 Ibid.
- 13 Carlyn M. Hood and others, “County Health Rankings: Relationships Between Determinant Factors and Health Outcomes,” *American Journal of Preventive Medicine* 50 (2) (2016): 129–135, available at <https://pubmed.ncbi.nlm.nih.gov/26526164/>; Sanne Magnan, “Social Determinants of Health 101 for Health Care: Five Plus Five”

- (Washington: National Academy of Medicine, 2017), available at <https://nam.edu/social-determinants-of-health-101-for-health-care-five-plus-five/>.
- 14 Ibid.; National Academy for State Health Policy, “Health Is Determined by Life Conditions,” available at <https://www.nashp.org/wp-content/uploads/2019/05/Slide2-Help-State-Leg-Improve-Health.pdf> (last accessed November 2021).
 - 15 Woolf, “Social and Economic Policies Can Help Reverse Americans’ Declining Health.”
 - 16 Ibid.; Robert A. Hummer and Elaine M. Hernandez, “The Effect of Educational Attainment on Adult Mortality in the United States,” *Population Bulletin* 68 (1) (2013): 1–16, available at <https://www.ncbi.nlm.nih.gov/pmc/articles/PMC4435622/>.
 - 17 Lekisha Daniel-Robinson and Jennifer E. Moore, “Innovation and Opportunities to Address Social Determinants of Health in Medicaid Managed Care” (Washington: Institute for Medicaid Innovation, 2019), available at https://www.medicaidinnovation.org/_images/content/2019-IMI-Social_Determinants_of_Health_in_Medicaid-Report.pdf.
 - 18 Crook and others, “How Are Payment Reforms Addressing Social Determinants of Health?”
 - 19 Centers for Disease Control and Prevention, “Social Determinants of Health: Know What Affects Health,” available at <https://www.cdc.gov/socialdeterminants/index.htm> (last accessed November 2021).
 - 20 Zachary Wortman, Elizabeth Cuervo Tilson, and Mandy Krauthamer Cohen, “Buying Health For North Carolinians: Addressing Nonmedical Drivers Of Health At Scale,” *Health Affairs* 39 (4) (2020), available at <https://www.healthaffairs.org/doi/10.1377/hlthaff.2019.01583>.
 - 21 Elizabeth Hinton and others, “A First Look at North Carolina’s Section 1115 Medicaid Waiver’s Healthy Opportunities Pilots” (San Francisco: Kaiser Family Foundation, 2019), available at <https://www.kff.org/report-section/a-first-look-at-north-carolinas-section-1115-medicaid-waivers-healthy-opportunities-pilots-issue-brief/>.
 - 22 Ibid.
 - 23 North Carolina Department of Health and Human Services, “NC Medicaid Managed Care: Community Partners: Managed Care and Healthy Opportunities Updates Public Hearing for the 1115 Waiver Amendment,” November 17, 2021, available at <https://medicaid.ncdhhs.gov/media/10454/download?attachment>.
 - 24 Centers for Medicare and Medicaid Services, “CMS Issues New Roadmap for States to Address the Social Determinants of Health to Improve Outcomes, Lower Costs, Support State Value-Based Care Strategies,” Press release, January 7, 2021, available at <https://www.cms.gov/newsroom/press-releases/cms-issues-new-roadmap-states-address-social-determinants-health-improve-outcomes-lower-costs>.
 - 25 Wortman, Cuervo Tilson, and Krauthamer Cohen, “Buying Health For North Carolinians.”
 - 26 HealthCare.gov, “Fee for Service,” available at <https://www.healthcare.gov/glossary/fee-for-service/> (last accessed January 2022); Medicaid.gov, “Managed Care,” available at <https://www.medicaid.gov/medicaid/managed-care/index.html> (last accessed January 2022).
 - 27 Crook and others, “How Are Payment Reforms Addressing Social Determinants of Health?”
 - 28 Ibid.; HealthCare.gov, “Value-Based Purchasing (VBP),” available at <https://www.healthcare.gov/glossary/value-based-purchasing-vbp/> (last accessed January 2022).
 - 29 North Carolina Justice Center, “NC Medicaid’s Move to Managed Care: What Health Care Advocates Need to Know” (Raleigh, NC: 2019), available at

https://www.ncjustice.org/wp-content/uploads/2019/06/HAP_NC-Medicoids-Move-to-Managed-Care-Webinar-Slide-Deck-6.3.19.pdf.

30 Ibid.

31 North Carolina Medicaid Division of Health Benefits, “View health plans,” available at <https://ncmedicaidplans.gov/find/viewhealthplans> (last accessed November 2021).

32 Liora Engel-Smith, “Almost 1.5 million consumers have been moved to NC Medicaid’s managed care. Now what?,” North Carolina Health News, June 4, 2021, available at <https://www.northcarolinahealthnews.org/2021/06/04/almost-1-5-million-consumers-have-been-moved-to-nc-medicoids-managed-care-now-what/>; North Carolina Medicaid Division of Health Benefits, “Dashboards,” available at <https://medicaid.ncdhhs.gov/reports/dashboards#enroll> (last accessed November 2021).

33 North Carolina Department of Health and Human Services, “Healthy Opportunities Lead Pilot Entity Request for Proposal (RFP),” December 23, 2019, available at <https://files.nc.gov/ncdhhs/medicaid/20191223-HO-LPE-RFP-Addendum-7-Revisions-to-the-RFP-TO-POST.pdf>.

34 Ibid.

35 Ibid.

36 NCCARE360, “Building Connections for a Healthier North Carolina,” available at <https://nccare360.org/> (last accessed January 2022).

37 North Carolina Department of Health and Human Services, “Using Standardized Social Determinants of Health Screening Questions to Identify and Assist Patients with Unmet Health-related Resource Needs in North Carolina” (Raleigh, NC: 2018), available at https://files.nc.gov/ncdhhs/documents/SDOH-Screening-Tool_Paper_FINAL_20180405.pdf.

38 Wortman, Cuervo Tilson, and Krauthamer Cohen, “Buying Health For North Carolinians.”

39 Hinton and others, “A First Look at North Carolina’s Section 1115 Medicaid Waiver’s Healthy Opportunities Pilots.”

40 Angela D. Garner, “North Carolina Medicaid Reform Demonstration” (Baltimore: Centers for Medicare and Medicaid Services Waiver Authority, 2019), available at <https://www.medicoid.gov/Medicoid-CHIP-Program-Information/By-Topics/Waivers/1115/downloads/nc/nc-medicoid-reform-ca.pdf>.

41 Ibid.

42 NCCARE360, “NCCARE360 Launches in Alamance, Guilford, and Rockingham Counties,” Press release, June 1, 2019, available at <https://nccare360.org/nccare360-launches-alamance-guilford-rockingham-counties/>.

43 NCCARE360, “Building Connections for a Healthier North Carolina,” available at <https://nccare360.org/> (last accessed November 2021).

44 Ken Otterbourg, “Hospital consolidation proves relentless across the state,” Business North Carolina, May 3, 2018, available at <https://businessnc.com/hospital-consolidation-proves-relentless-across-the-state/>.

45 Bryan Roth, “Duke Providers Connect Eligible Patients with Important Community Resources,” Duke Health Blog, April 29, 2021, available at <https://www.dukehealth.org/blog/duke-providers-connect-eligible-patients-important-community-resources>.

46 UNC Health and UNC School of Medicine, “UNC Health Goes Live with NCCARE360,” Press release, December 18, 2020, available at <https://news.unchealthcare.org/2020/12/unc-health-goes-live-with-nccare360/>.

- 47 Neil Cotiaux, "Vidant Health and 19 NC counties join NCCARE360 network," Carolina Public Press, May 6, 2020, available at <https://carolinapublicpress.org/30419/vidant-health-and-19-nc-counties-join-nccare360-network/>.
- 18 Fitch Ratings, "Fitch Affirms Duke University Health System (NC) Bond Rating at 'AA'; Outlook Stable," June 25, 2021, available at <https://www.fitchratings.com/research/us-public-finance/fitch-affirms-duke-university-health-system-nc-bond-rating-at-aa-outlook-stable-25-06-2021#:~:text=Based%20on%202019%20inpatient%20data,%25%20and%2024.5%25%2C%20respectively.>
- 19 North Carolina Department of Health and Human Services, "Support Services Program," available at <https://covid19.ncdhhs.gov/SSP> (last accessed January 2022).
- 50 North Carolina Department of Health and Human Services and Partners In Health, "The North Carolina Community Health Worker and Support Services Programs: Promoting Safe Quarantine and Isolation for COVID-19 in Marginalized Populations" (Raleigh, NC: 2021), available at https://www.pih.org/sites/default/files/lc/LT-CRC_case_study_NC_march_2021_Final.pdf.
- 51 Ibid.
- 52 Ibid.
- 53 Ibid.
- 54 Ibid.
- 55 Wortman, Cuervo Tilson, and Krauthamer Cohen, "Buying Health For North Carolinians."
- 56 Ibid.
- 57 NCCARE360, "NCCARE360 Quarterly Report February 2021" (Raleigh, NC: 2021), available at <https://nccare360.org/wp-content/uploads/2021/02/NCCARE360-Quarterly-Report-Feb-2021.pdf>.
- 58 North Carolina Department of Health and Human Services, "Healthy Opportunities Lead Pilot Entity Request for Proposal (RFP)."
- 59 Amanda Van Vleet, "Healthy Opportunities in North Carolina," National Academy for State Health Policy Annual State Health Policy Conference 2021, September 22, 2021, on file with author.
- 50 Danielle Daly and Angela D. Garner, "State Demonstrations Group" (Baltimore: Centers for Medicare and Medicaid Services, 2020), available at <https://www.medicare.gov/Medicaid-CHIP-Program-Information/By-Topics/Waivers/1115/downloads/nc/Medicaid-Reform/nc-medicare-reform-demo-eval-des-appvl-01152020.pdf>.
- 61 Van Vleet, "Health Opportunities in North Carolina."
- 52 Ibid.
- 53 Gayle Shier and others, "Strong Social Support Services, Such As Transportation And Help For Caregivers, Can Lead To Lower Health Care Use and Costs," *Health Affairs* 32 (3) (2013), available at <https://www.healthaffairs.org/doi/full/10.1377/hlthaff.2012.0170>.
- 54 Shreya Kangovi and others, "Evidence-Based Community Health Worker Program Addresses Unmet Social Needs And Generates Positive Return On Investment," *Health Affairs* 39 (2) (2020), available at <https://www.healthaffairs.org/doi/full/10.1377/hlthaff.2019.00981>.
- 55 Zachary Pruitt and others, "Expenditure Reductions Associated with a Social Service Referral Program," *Population Health Management* 21 (6) (2018), available at <https://www.liebertpub.com/doi/full/10.1089/pop.2017.0199>.

- 36 Colleen Varcoe and others, "Attributing selected costs to intimate partner violence in a sample of women who have left abusive partners: a social determinants of health approach," *Canadian Public Policy* 37 (3) (2011): 358–380, available at <https://pubmed.ncbi.nlm.nih.gov/22175082/>.
- 37 Lana Wells, J.C. Herbert Emery, and Casey Boodt, "Preventing Domestic Violence in Alberta: A Cost Savings Perspective," *University of Calgary SPP Research Papers* 5 (17) (2012), available at https://papers.ssrn.com/sol3/papers.cfm?abstract_id=2088960.
- 38 Vincent E. Chong and others, "Hospital-centered violence intervention programs: a cost-effectiveness analysis," *The American Journal of Surgery* 209 (4) (2015): 597–603, available at <https://www.sciencedirect.com/science/article/abs/pii/S0002961014006230>.
- 39 Jonathan Purtle and others, "Cost-Benefit Analysis Simulation of a Hospital-Based Violence Intervention Program," *American Journal of Preventive Medicine* 48 (2) (2015): 162–169, available at <https://www.sciencedirect.com/science/article/abs/pii/S0749379714005017>.
- 70 Kyle Fischer, Jonathan Purtle, and Theodore Corbin, "The Affordable Care Act's Medicaid expansion creates incentive for state Medicaid agencies to provide reimbursement for hospital-based violence intervention programmes," *Injury Prevention* 20 (6) (2014): 427–430, available at <https://injuryprevention.bmj.com/content/20/6/427.info>.
- 71 Donna J. Biederman and others, "Health care utilization following a homeless medical respite pilot program," *Public Health Nursing* 36 (3) (2019): 296–302, available at <https://pubmed.ncbi.nlm.nih.gov/30746762/>; Ibid.
- 72 Van Vleet, "Healthy Opportunities in North Carolina."
- 73 Jacqueline LaPointe, "How Addressing Social Determinants of Health Cuts Healthcare Costs," *Revcycle Intelligence*, June 25, 2018, available at <https://revcycleintelligence.com/news/how-addressing-social-determinants-of-health-cuts-healthcare-costs>.
- 74 Giancarlo Buitrago, "Targeting malnutrition: Nutrition programs yield cost savings for hospitalized patients," *Clinical Nutrition* 39 (9) (2020): 2896–2901, available at <https://www.sciencedirect.com/science/article/abs/pii/S0261561419332133>.
- 75 Danielle H. Rochlin and others, "Economic Benefit of 'Modern' Nonemergency Medical Transportation That Utilizes Digital Transportation Networks," *American Journal of Public Health* 109 (3) (2019): 472–474, available at <https://www.ncbi.nlm.nih.gov/pmc/articles/PMC6366524/>.
- 76 Michael Adelberg and others, "Non-Emergency Medical Transportation: Findings from a Return on Investment Study" (Washington: Medical Transportation Access Coalition, 2018), available at <https://mtacoalition.org/wp-content/uploads/2018/07/NEMT-ROI-Methodology-Paper.pdf>; Medical Transportation Access Coalition, "Health and Economic Benefits," available at <https://mtacoalition.org/medical-transportation-101/health-economic-benefits/> (last accessed December 2021).
- 77 Daly and Garner, "State Demonstrations Group."
- 78 Angela D. Garner, "North Carolina Medicaid Reform Demonstration Updated Evaluation Design Report: Incorporating CMS Feedback Received on June 17, 2019 and October 24, 2019" (Baltimore: Centers for Medicare and Medicaid Services, 2019), available at <https://www.medicare.gov/Medicaid-CHIP-Program-Information/By-Topics/Waivers/1115/downloads/nc/Medicaid-Reform/nc-medicare-reform-demo-eval-des-appvl-01152020.pdf>.
- 79 Ibid.
- 30 Capitation refers to fixed payments to providers per patient for a set period of time. Global budgets include capitated payments for a specified population, rather than for

individuals or services.

- 81** North Carolina Medicaid Division of Health Benefits, “North Carolina’s Transformation to Medicaid Managed Care,” available at <https://medicaid.ncdhhs.gov/transformation> (last accessed November 2021).
- 32** North Carolina Division of Health Benefits, “Fact Sheet NC Medicaid Managed Care” (Raleigh, NC: 2021), available at <https://files.nc.gov/ncdma/documents/Medicaid/NCMT-Fact-Sheet-ManagedCarePopulations-20210429.pdf>.
- 33** Kaiser Family Foundation, “Total Medicaid MCO Enrollment,” available at <https://www.kff.org/other/state-indicator/total-medicare-mco-enrollment/?currentTimeframe=0&sortModel=%7B%22colId%22:%22Location%22,%22sort%22:%22asc%22%7D> (last accessed January 2022).
- 34** Kaiser Family Foundation, “Share of Medicaid Population Covered Under Different Delivery Systems,” available at <https://www.kff.org/edicaid/state-indicator/share-of-medicare-population-covered-under-different-delivery-systems/?currentTimeframe=0&sortModel=%7B%22colId%22:%22Location%22,%22sort%22:%22asc%22%7D> (last accessed November 2021).
- 35** Kaiser Family Foundation, “States Reporting Social Determinant of Health Related Policies Required in Medicaid Managed Care Contracts,” available at <https://www.kff.org/other/state-indicator/states-reporting-social-determinant-of-health-related-policies-required-in-medicare-managed-care-contracts/?currentTimeframe=0&sortModel=%7B%22colId%22:%22Location%22,%22sort%22:%22asc%22%7D> (last accessed November 2021).
- 36** Jennifer E. Moore and others, “Medicaid Access and Coverage in 2019” (Washington: Institute for Medicaid Innovation, 2020), available at https://www.medicareinnovation.org/_images/content/2020-IMI-Medicaid_MCO_Survey-Report.pdf.
- 37** Crook and others, “How Are Payment Reforms Addressing Social Determinants of Health?”
- 38** Ibid.
- 39** Oregon Health Authority, “Coordinated Care Organizations (CCO),” available at <https://www.oregon.gov/oha/hsd/ohp/pages/coordinated-care-organizations.aspx> (last accessed November 2021).
- 40** Sophia Tripoli and others, “To Advance Health Equity, Federal Policy Makers Should Build On Lessons From State Medicaid Experiments,” *Health Affairs*, April 14, 2021, available at <https://www.healthaffairs.org/doi/10.1377/hblog20210409.908010/full/>.
- 91** Oregon Health Authority, “Health-Related Services Brief” (Salem, OR: 2021), available at <https://www.oregon.gov/oha/HPA/dsi-tc/Documents/OHA-Health-Related-Services-Brief.pdf>.
- 32** Relating to coordinated care organizations; and declaring an emergency of 2018, H.B. 4018, Oregon State Legislature 2018 Regular Session (April 11, 2018), available at <https://olis.oregonlegislature.gov/liz/2018R1/Measures/Overview/HB4018>; Oregon State Bar, “2018 Oregon Legislation Highlights” (Tigard, OR: 2018), available at https://www.osbar.org/_docs/lawimprove/2018LegislationHighlights.pdf; Crook and others, “How Are Payment Reforms Addressing Social Determinants of Health?”
- 33** Diana Crumley and Marlise Pierre-Wright, “Addressing Social Determinants of Health through Medicaid Accountable Care Organizations,” Center for Health Care Strategies, April 18, 2018, available at <https://www.chcs.org/addressing-social-determinants-health-medicare-accountable-care-organizations/>.
- 34** Tripoli and others, “To Advance Health Equity, Federal Policy Makers Should Build On Lessons From State Medicaid Experiments.”

- ³⁵ Ibid.; Crumley and Pierre-Wright, “Addressing Social Determinants of Health through Medicaid Accountable Care Organizations.”
- ³⁶ Tripoli and others, “To Advance Health Equity, Federal Policy Makers Should Build On Lessons From State Medicaid Experiments.”
- ³⁷ Washington State Health Care Authority, “Accountable Communities of Health (ACHs),” available at <https://www.hca.wa.gov/about-hca/medicaid-transformation-project-mtp/accountable-communities-health-achs> (last accessed November 2021); Elizabeth Hinton and Lina Stolyar, “Medicaid Authorities and Options to Address Social Determinants of Health (SDOH)” (San Francisco: Kaiser Family Foundation, 2021), available at <https://www.kff.org/medicaid/issue-brief/medicaid-authorities-and-options-to-address-social-determinants-of-health-sdoh/>.
- ³⁸ Hinton and Stolyar, “Medicaid Authorities and Options to Address Social Determinants of Health (SDOH).”
- ³⁹ Ibid.
- ⁴⁰ Washington State Health Care Authority, “One year extension and amendment,” available at <https://www.hca.wa.gov/about-hca/medicaid-transformation-project-mtp/one-year-extension-and-amendment> (last accessed November 2021).
- ⁴¹ Pennsylvania Pressroom, “Wolf Administration Launches Regional Accountable Health Councils Focused on Promoting Health Equity and Reducing Disparities Across Pennsylvania,” Press release, March 17, 2021, available at https://www.media.pa.gov/pages/dhs_details.aspx?newsid=673.
- ⁴² Ibid.; Pennsylvania Department of Human Services, “Regional Accountable Health Councils (RAHCs),” available at <https://www.dhs.pa.gov/HealthInnovation/Documents/RAHC%20Program%20Overview%201.11.2021.pdf> (last accessed November 2021).
- ⁴³ Pennsylvania Pressroom, “Wolf Administration Launches Regional Accountable Health Councils Focused on Promoting Health Equity and Reducing Disparities Across Pennsylvania.”
- ⁴⁴ Crook and others, “How Are Payment Reforms Addressing Social Determinants of Health?”
- ⁴⁵ Ibid.
- ⁴⁶ Kaiser Family Foundation, “States Reporting Social Determinant of Health Related Policies Required in Medicaid Managed Care Contracts.”
- ⁴⁷ North Carolina Department of Health and Human Services, “Healthy Opportunities and Medicaid Transformation,” available at <https://www.ncdhhs.gov/about/departments/initiatives/healthy-opportunities/healthy-opportunities-pilots/healthy> (last accessed November 2021).
- ⁴⁸ North Carolina Department of Health and Human Services, “Healthy Opportunities Pilots Fact Sheet,” available at <https://www.ncdhhs.gov/media/12641/download?attachment> (last accessed January 2022).
- ⁴⁹ NCCARE360, “About NCCARE360,” available at <https://nccare360.org/about/> (last accessed January 2022); United Way Asheville and Buncombe County, “Get Help: Dial 2-1-1,” available at <https://www.unitedwayabc.org/get-help-dial-2-1-1#collapse-vbp-accordion-433-1> (last accessed January 2022).
- ⁵⁰ NCCARE360, “NCCARE360 Quarterly Report February 2021.”
- ⁵¹ Ibid.
- ⁵² Crook and others, “How Are Payment Reforms Addressing Social Determinants of Health?”

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AUTHORS

Nicole Rapfogel

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Jill Rosenthal

Director, Public Health

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