INSTITUTE FOR MEDICAID INNOVATION

INNOVATION AND OPPORTUNITIES TO ADDRESS SOCIAL DETERMINANTS OF HEALTH IN MEDICAID MANAGED CARE

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The Medicaid program provides health care coverage to more than 70 million Americans who are most vulnerable to the negative effects of unmet social needs. An important opportunity exists within the Medicaid program to identify and address the unmet social needs and risk factors that have a significant impact on health outcomes and costs. With access to enrollee health data, Medicaid managed care organizations (MMCOs), with the support of state Medicaid agencies and community-based organizations (CBOs), are well positioned to coordinate both the health and social components of care that will have the most influence on the outcomes of individual enrollees (and families). However, better coordination, supported by state policy and financial mechanisms, might be needed to improve MMCOs' capacity to fulfill this opportunity. The extent to which the Medicaid program can successfully address the social determinants of health could have a substantial impact on population health.

The mission of the Institute for Medicaid Innovation is to improve the lives of Medicaid enrollees through the development, implementation, and diffusion of innovative and evidence-based models of care that promote quality, value, equity and the engagement of patients, families, and communities.

Increasingly, it is recognized that non-clinical factors contribute significantly to the health outcomes of society. Clinical care is only one factor influencing health outcomes and may be responsible for 10-15 percent of preventable mortality in the United States.[1] Yet, according to 2016 data, health care spending made up 17.9 percent of the U.S. gross domestic product (GDP), at $3.3 trillion.[2] A range of other factors, collectively categorized as social determinants of health (SDOH), have a more profound influence on care, outcomes, and population health. According to the World Health Organization (WHO), SDOH are "the conditions in which people are born, grow, live, work and age."[3] This constellation of environmental, political, socioeconomic, environmental, and behavioral factors contribute to 60 percent of preventable mortality.[1, 4]

Social determinants can complicate access to care or adherence to care plans. In other cases, risk factors, such as lead contamination of water, contribute more directly to poor health and outcomes. Other factors, such as smoking, may be associated with social normative behaviors which contribute to poor health. The complex relationships between social determinants

and health result in inequities in care and outcomes, with greater burden of major disease, disability, and mortality.[5, 6, 7, 8] Although social determinants affect all individuals to varying degrees, low-income individuals, as well as those of certain racial and ethnic groups, are disproportionally affected.[8] Evidence points to the potential for an upstream focus on SDOH to result in overall reductions in health care use and medical care expenditures, while improving outcomes.[9, 10]

Table 1. Examples of How Social Needs Affect the Medicaid Program

Social Determinant	Impact in the Medicaid Population
Education	Thirty-six percent (36%) of individuals covered by Medicaid have less than a high school education.[13] Low educational levels are associated with an increased risk for major disease, disability, and mortality due to poor health literacy, unhealthy behaviors, income (relationship to poverty status), and other resources tied to income and/or employment. [4,11]
Transportation	Medicaid enrollees may have more difficulty accessing non-emergency transportation to covered services than people who are privately insured (MACPAC 2018).[12] This affects the ability of individuals to obtain routine and preventive care.
Social Context	Low income is often associated with high-stress environments and social interactions. For example, intimate partner violence is linked to a host of physical and behavioral health conditions and is associated with increased morbidity and use of clinical services.[14] Other types of violence may be prevalent in the communities where Medicaid populations reside. Behaviors such as smoking and alcohol/substance misuse, which are linked to chronic disease, are common within Medicaid populations.[13]
Housing Quality and Instability	Low-income individuals live in areas with substandard housing and within communities that do not promote health.[8] Availability of affordable housing affects low-income communities, putting them at or near the brink of homelessness with just one unforeseen financial episode. Approximately 7% of homeless individuals live in rural areas, and many others are at risk of homelessness.[15]
Food Insecurity	The U.S. Department of Agriculture defines "food insecurity" as a reduction in the availability of high-quality food and the variety of food. Also, "food insecurity" refers to the availability of resources to purchase food and the involuntary reduction of food intake.[16] Food insecurity increases the risk of chronic disease and developmental disorders in children.
Poverty	According to the U.S. Census Bureau, the official poverty rate in 2017 was 12.3%, at approximately 40 million individuals. Those with at least a bachelor's degree had the lowest rate of poverty.[17] Poverty is linked to numerous other social risk factors, including housing quality, food insecurity, and education, with their respective impacts on health outcomes. Individuals with low incomes have higher rates of mortality.

Source: Institute for Medicaid Innovation. (2019). "Innovations and Opportunities to Address Social Determinants of Health in Medicaid Managed Care."

Unmet social needs have a direct impact on the overall health and well-being of the Medicaid population; as shown in Table 1. For instance, it is known that approximately 36 percent of individuals enrolled in Medicaid have less than a high school education. Factors associated with low educational levels, such as health literacy, are also associated with an increased risk for disease, disability, and mortality.[11] As such, policymakers and Medicaid managed care organizations (MMCOs) are exploring opportunities to integrate clinical care with social services and other supports. Given that Medicaid provides health care coverage for more than 70 million low-income individuals, families, people with disabilities, and seniors, it is well positioned to identify and coordinate the SDOH needs of some of the most vulnerable people in the United States.[12]

Table 2. Examples of How Medicaid Populations are Affected by Social & Health Needs

Population	Social & Health Needs
Elderly and Disabled Individuals	Elderly and disabled individuals have complex health needs, as they are often affected by multiple chronic conditions, cognitive disability, and social isolation and require long-term care services and supports.[18] The care needed by these individuals may extend beyond clinical care and include activities of daily living such as bathing and eating.[19]
Children in the Foster Care System	Most children in foster care are covered by Medicaid.[20] Children in the foster care system have a variety of social risk factors – including abuse, household substance use disorders, and poor living conditions. They are more likely to have behavioral health disorders, developmental challenges, and chronic health conditions. This social and health context requires coordination across multiple agencies and organizations to meet a complex host of needs.[20, 21]
Formerly Incarcerated Individuals	Although incarcerated individuals are not eligible for Medicaid coverage, certain inpatient services may be covered by Medicaid. Individuals involved in the justice system are often affected by substance use disorders, chronic health conditions, and mental and behavioral health challenges.[22] These risk factors, along with others such as educational attainment, housing instability, and unemployment, require clinical and community integration strategies.[23]
Chronically Homeless	Although perceived as an urban problem, approximately 7% of homeless individuals live in rural areas, with many others in rural communities considered as being at risk of homelessness.[15] Chronic homelessness is associated with increased risk of communicable diseases, environmental exposures, mental health disorders, asthma, and other poor health outcomes. Chronic homelessness is linked to high utilization of clinical services and increased incidence of mortality.[24]

Source: Institute for Medicaid Innovation. (2019). "Innovations and Opportunities to Address Social Determinants of Health in Medicaid Managed Care."

The Medicaid Policy Landscape

Serving nearly 20 percent of the U.S. population, Medicaid is the largest insurer in the country; it provides safety-net coverage for low-income families, pregnant women, children, seniors, individuals with disabilities, and long-term care needs. State Medicaid programs have the latitude to expand coverage to additional populations such as low-income childless adults or other low-income groups. The United States has a high prevalence of high-risk populations, including those with multiple chronic conditions and mental health disorders, which require coordination of multiple provider types and settings (Table 2). Federal requirements establish minimum requirements for medically necessary benefits; however, states have additional options for services and benefits to address their population needs. As a result, each state Medicaid program considers opportunities to enhance the delivery of services to specific subpopulations.

Federal Policies

Federal and state policies, along with the health system and market, have driven improvement in costs and population health outcomes. At the federal level, health care delivery system reform is promoted to address cost, efficiency, beneficiary and family experience, and quality improvement goals through a variety of mechanisms, including Section 1915(c) and Section 1115 waivers, alternative payment models, policy guidance, and regulations.

Section 1915 (c) Authority

The Medicaid home and community-based services (HCBS) program provides a mechanism to address the long-term services and supports (LTSS) for individuals with specialized health care needs in non-institutional settings. Although the HCBS program targets specific populations based on diagnoses, the program components provide a model for considering the social determinants of health more broadly for the Medicaid population. Specifically, the HCBS program requires person-centered plans of care while also ensuring the protection of health and welfare of those covered by the waiver. Program requirements include support for medical as well as a range of non-medical supports with routine access by the care team in the individual's living environment. For example, under the program, states may cover housing, tenancy support, and employment-related services for those with certain disabilities or medical conditions.[19] These programs have demonstrated savings to the Medicaid program by reductions in readmissions, emergency department visits, and nursing home care. Currently, there are more than 300 existing waivers.[25]

Section 1115 Authority

The Section 1115 authority is a long-standing mechanism to provide states with the flexibility to conduct pilots and demonstration projects tailored to optimize the delivery of care within the state. Delivery System Reform Incentive Payment (DSRIP) programs, authorized under Section 1115 authority, provide a mechanism for state Medicaid agencies to innovate care delivery and payment linked to demonstrable improvements in health outcome metrics. The funds provided under the program are based on projected savings from implementation of state innovations. As an example, the Section 1115 waivers in Kansas, Massachusetts, New Jersey, Oregon, New York, and Texas include features that facilitate coordination between the health system and the social services systems, including support services and housing.[26,27]

Among the state projects, New York's DSRIP approach is perhaps the most ambitious, as it seeks to integrate clinical providers with behavioral health, community, and social services organizations across the

entire state. It consists of four components: 1) a toolkit of intervention projects; 2) community needs assessments; 3) project selection with a role for community-based organizations; and 4) implementation with continued funding tied to a 25 percent reduction in avoidable hospitalization and other quality metrics.[28] A host of traditional providers (e.g. hospitals), community leaders, and community-based organizations (CBOs) are involved (e.g., food banks, homeless shelters, community health centers, and specific treatment such as AIDS facilities), depending on the intervention of the initiative and geographic region. Funding pools allow for payment for services to organizations that otherwise would not receive Medicaid funding. In addition to achieving quality metric goals and cost savings, the initiative seeks to create sustainable funding streams for community-based organizations that have an undervalued impact on outcomes.

Alternative Payment Models

As federal policymakers seek to increase the value of care, accountable care communities were promoted by the Centers for Medicare and Medicaid Services (CMS) as an approach to address the gap in coverage and services between social/community resources and clinical care.[29] A five-year investment by the CMS supported the scaling of emerging all-payer delivery system reform efforts that incorporated community-based interventions that demonstrated promise in health care utilization, cost, and quality. To support the implementation of the accountable care communities, the CMS developed the Accountable Health Communities Core Health-Related Social Needs (AHC-HRSN) screening tool to assess five critical areas of SDOH—transportation, housing instability, utility assistance, food insecurity, and interpersonal safety. Questions were adapted from other validated instruments and focused on the five domains, given the evidence base and availability of community resources to address the needs.[30]

As of September 2018, there were 31 organizations implementing an AHC model; with all of the models implementing a variety of approaches that center on the five critically defined areas.[31] In Hawaii, the accountable health community model screens for social needs at clinical sites, including federally qualified health centers (FQHCs) and behavioral health facilities. The core approach focuses on screening of social needs for all Medicaid (and Medicare) enrollees (Keir, n.d.).[32] Referrals include information on the core social needs of housing, food, utilities, transportation, and inter-personal violence (IPV). Once an enrollee enters into a clinical site and has a positive screening, the case is stratified by risk levels defined by the number of emergency department visits within a 12-month period. If defined as low risk, they may receive community referral and other information along with usual care. However, high-risk individuals receive more-targeted intervention(s) and navigation support through the necessary social supports. It is expected that each AHC model includes key metrics of success such as analyses of emergency department visits, readmissions, cost savings, and return on investment (ROI).

Managed Care Regulation

Federal regulations provide another mechanism to both improve responsiveness and drive changes to the health care delivery system. In May 2016, the CMS released the Medicaid and CHIP Managed Care Final Rule (CMS-2390-F), which updated the requirements for operations and oversight of managed care entities that provide coverage to Medicaid enrollees. Since managed care is now the primary care delivery system for people covered by Medicaid, this update provided support for delivery system reform and strengthened quality improvement, coordination, data transparency, and service standards. Taking cues from the home and community-based services (HCBS) program, the final rule created a framework for person-centered care that considers each enrollee's needs within the community.

Table 3. Managed Care Regulations that Reduce Administrative Barriers

Mechanism	Description	Example
Ensuring provider payments reinforce a commitment to addressing SDOH (42 C.F.R. § 438.6(c)).	Allows states to direct contracted plans to implement alternative payment models with targeted providers. Previously, states had little control over how plans pay their providers. Often plans still use a fee-for-service model with network providers.	State requires health plans to provide incentive payments to network providers who routinely screen for nonmedical problems such as food security, domestic abuse, or environmental hazards.
Directly incentivizing health plans to invest in efforts to meet nonmedical needs (42 C.F.R. § 438.6(b)).	Allows states to create financial incentives, such as quality withholds or quality incentive arrangements, that hold health plans accountable for state-specified performance metrics. These can include measures tied to population health outcomes.	States withhold part of a plan's capitation rate contingent on meeting quality metrics linked to specific population health interventions, such as improved lead screening or reduced maternal mortality.
Making it easier for health plans to cover nontraditional services (42 C.F.R. § 438.3(e)).	"In-lieu-of" services can be covered by health plans and count toward capitation rate setting and the services side of the medical loss ratio (MLR).	Offering in-home prenatal visits as an alternative to traditional clinical office visits can help flag potential risks or issues.
	Value-added services are plan services not included in the capitation rate. These services do count as services for the purposes of the MLR, which removes a potential disincentive for plans to cover them.	Putting a shower grab bar in an older adult's home can reduce the risk of a fall. A plan may pay for this even if it is not covered under its contract and count the expense as a service for the purposes of the MLR.
Strengthening care coordination across clinical and nonclinical contexts and improving care transitions (42 C.F.R. § 438.208(b)).	Requires health plans to coordinate an enrollee's services with services provided by community and social-support providers, as well as services covered by other managed care entities and Medicaid FFS providers. The full implications of this requirement will depend on subsequent CMS guidance.	State policies promoting such coordination could include performance metrics that track referrals to social services, inclusion of social or community health workers in care coordination teams, or requirements to ensure adequate data sharing across providers.

Source: The Commonwealth Fund. (November 2017). "Addressing the social determinants of health through Medicaid managed care."

The rule allows states to more directly affect the arrangement among managed care plans, payment, and their provider networks, including value-based payment to providers. The community care coordination services provision requires that Medicaid managed care organizations, under their capitation rate, coordinate services that enrollees receive in community-based settings.[1] It also defined value-added services as discretionary services that are not part of the standard benefit package but may improve quality of care. Since these services are outside of required benefits, they may not be included in the capitation rate.[1] The Managed Care Final Rule also defined the state's responsibility and requirements to respond to the National Quality Strategy (NQS) requirements; including a plan to identify and reduce disparities.[33] These provisions provide a framework for managed care entities to invest in social resources that improve population management and health outcomes (Table 3).

Medicaid Managed Care and Social Determinants of Health

With more than 68 percent of individuals covered by Medicaid receiving their care through comprehensive managed care arrangements, MCOs have an important role to support changes across the delivery system.[34] Care management has always been an important component of managed care; however, its implementation has historically focused on disease management. Variation has existed across managed care plans and within markets on the degree to which social needs were addressed as part of care management. However, care management and coordination roles increasingly include more-deliberate attention to the social drivers of health care and outcomes.

In a recent Commonwealth Fund study, Medicaid MCOs were asked about their efforts to address the social determinants of health. Of the 17 reporting MMCOs representing care delivery in 10 states with large Medicaid enrollments, housing, behavioral health, substance abuse and nutrition/food security were the most common targeted areas.[35] Other Medicaid MCOs focused on specific target populations such as formerly incarcerated individuals. Medicaid MCOs are using a variety of tools at their disposal to address the social determinants within their enrolled populations, including screening approaches coupled with care coordination (via "warm handoffs") and partnership approaches.

A retrospective claims study of Gateway Health's Medicaid managed care data demonstrated an average spending reduction of $2,443 in second-year medical expenditures for individuals who received coordinated referral services to address social needs.[36] Gateway Health uses a health engagement management system to collect SDOH information in addition to other operational data (e.g. revenue control, customer engagement, and cost data). The Medicaid MCO recognized that the determinants data matched with claims data provides risk stratification that can both explain provider performance on standardized quality measures and provide information to support interventions to better manage their patient population. As such, the health plan has improved performance on chronic disease measures in the 3-4 percent range for several years. [37]

At Amerihealth Caritas DC, "food as medicine" initiatives are one approach that the MMCO is utilizing to better support its Medicaid population. The MMCO developed a partnership with several community-based organizations to improve access to nutritious meals. The approach includes vouchers to community farmer's markets, as well as meal delivery to address client-specific chronic conditions such as pre-diabetes, diabetes, or hypertension. In home, culturally appropriate healthy food counseling is used to help promote long-term behavioral change to affect the health outcomes of both enrolled individuals and

families. The MMCO monitors key health metrics among program participants with the goal of outcomes management. The plan has noted that these investments have resulted in cost savings achieved by reductions in readmissions and emergency department visits.

Barriers in Addressing Social Needs in Medicaid: Coordination, Data Sharing, and Financing

Although approaches to addressing social needs are emerging, barriers to effectively address social determinants persist. One key challenge is that silos between social services, health organizations, and providers prevent the robust exchange of information and data about available services, unmet needs, and costs.[18] According to a nationwide survey conducted by the Institute for Medicaid Innovation, Medicaid MCO respondents noted that better information exchange about the social determinants of health would facilitate care management.[38] Respondents noted that community information such as school enrollment and supportive housing services would assist their efforts to more efficiently provide services to enrollees. For those enrolled in the foster care and/or criminal justice system, given the challenges with identification, tracking, and managing the care, information that denotes their status in these systems would be useful for Medicaid MCOs to track and manage care.

The referral system for those requiring assistance with addressing social needs is another barrier. Once a social determinant of health is identified, the Medicaid enrollee is then referred to services. However, not all referral networks have been established and may not be maintained with current and accurate information. As Medicaid and its care delivery partners delve further into systematically identifying social needs, the capacity to handle the referrals continues to be a challenge. Although estimates about the degree of unmet need might exist, it might not be possible to quantify the capacity of the network to address those needs. Therefore, states and Medicaid MCOs need to identify the extent to which social interventions are available and for which populations.

Although updates to the managed care regulations facilitate coverage of non-traditional health services, such as those provided by community-based organizations, more information is needed on the value of social services rendered to better quantify the cost and evaluate the impact of social intervention efforts.[36] To facilitate the valuation of services, there is a need to establish units of service related to some quantity of social intervention and billing codes to support payment between health plans and community-based organizations and to establish a total cost of care. The absence of this type of infrastructure poses challenges to Medicaid MCOs with implementing incentives or value-based purchasing strategies with partners.[35]

Leveraging community-based organizations or other non-traditional partners to address SDOH may be further impeded by more general programmatic funding constraints. Although Medicaid MCOs continue to invest in programs, a documented return on investment (ROI) might not be evident for some interventions. Given the longer time horizon for some upstream investments to address social determinants, outcome improvements and savings may be realized by different segments of the health system, government agency/program, or jurisdiction. Meanwhile, state fiscal constraints may demand that Medicaid MCOs deliver shorter-term cost savings to Medicaid programs.[39] The "wrong door/pocket" phenomenon associated with investments in social interventions creates particular risks for Medicaid MCOs if capitation rates are reduced because of reductions in overall medical care expenditures.

Opportunities to Address Social Needs in the Medicaid Population

The current health care delivery system has the potential and opportunity to better leverage providers, state agencies, community health workers, or other existing community-based organizations. Consideration of how resources may be integrated for more efficient deployment of assistance to address unmet needs is crucial. However, to support the integration of care across clinical and social settings, a fundamental understanding of the social needs of the population and the available resources to address unmet needs is needed.

One opportunity to address social needs is the systematic and continuous collection and exchange of data regarding the SDOH. The collection and exchange of SDOH information, as part of the electronic data interchange (EDI) 834 enrollment form and data maintenance transactions, could provide an efficient mechanism to identify Medicaid enrollees who have social needs. Also, utilizing the 834 form could facilitate the timely activation of the care management and referral processes through the Medicaid MCO. In addition, policies at the state level could lay the foundation for the exchange of relevant data elements between state-level departments such as education or housing and Medicaid MCOs. Electronic health records might also be another approach to capture SDOH data that develop profiles containing social-need information that could be used across clinical sites.[40]

To develop such profiles about SDOH, the National Academy of Medicine recommends that all members of the integrated care team have access to patients' SDOH profile.[41] However, approaches are needed to systematically capture and share these data to affect action. Implementation of ICD-10 coding (the International Classification of Disease Version 10) provides an expanded opportunity for the systematic collection of SDOH information through the use of specific Z codes across the health care continuum to support the provision of high-quality health care (Table 4). With the use of the Z codes, ICD-10 can capture information related to an individual's living and social environment, educational attainment, adverse childhood events (ACEs), and other psychosocial circumstances (Table 4). Each Z code has sub-codes to further define the specific risk factors within the broad category. However, the codes are currently widely underused, which limits opportunities to reliably identify and respond to social needs.[42]

Table 4. ICD-10-CM Codes for Capturing Social Determinants of Health Data[43]

ICD-10-CM Code	Category	Problems/Risk Factors Included in Category
Z55	Problems related to education and literacy	Illiteracy, schooling unavailable, underachievement in school, educational maladjustment and discord with teachers and classmates.
Z56	Problems related to employment and unemployment	Unemployment, change of job, threat of job loss, stressful work schedule, discord with boss and workmates, uncongenial work environment, sexual harassment on the job, and military deployment status.
Z57	Occupational exposure to risk factors	Occupational exposure to noise, radiation, dust, environmental tobacco smoke, toxic agents in agriculture and in other industries, extreme temperature, and vibration.
Z59	Problems related to housing and economic circumstances	Homelessness; inadequate housing; discord with neighbors, lodgers, and landlord; problems related to living in residential institutions; lack of adequate food and safe drinking water; extreme poverty; low income; insufficient social insurance and welfare support.
Z60	Problems related to social environment	Adjustment to life-cycle transitions, living alone, acculturation difficulty, social exclusion and rejection, target of adverse discrimination and persecution.
Z62	Problems related to upbringing	Inadequate parental supervision and control, parental overprotection, upbringing away from parents, child in welfare custody, institutional upbringing, hostility towards and scapegoating of child, inappropriate excessive parental pressure, personal history of abuse in childhood, personal history of neglect in childhood. Z62.819 Personal history of unspecified abuse in childhood, parent-child conflict, and sibling rivalry.
Z63	Other problems related to primary support group, including family circumstances	Absence of family member, disappearance and death of family member, disruption of family by separation and divorce, dependent relative needing care at home, stressful life events affecting family and household, stress on family because of return of family member from military deployment, alcoholism and drug addiction in family.

Z64	Problems related to certain psychosocial circumstances	Unwanted pregnancy, multiparity, and discord with counselors.
Z65	Problems related to other psychosocial circumstances	Conviction in civil and criminal proceedings without imprisonment; imprisonment and other Incarceration; release from prison; other legal circumstances; victim of crime and terrorism; and exposure to disaster, war, and other hostilities.

Source: Institute for Medicaid Innovation. (2019). "Innovations and Opportunities to Address Social Determinants of Health in Medicaid Managed Care."

ICD 10 codes may be useful across clinical settings, but there are several ways that SDOH information can be collected for documentation and export into the clinical file. The information may be collected from a patient-completed questionnaire (paper-based or electronic), patient portals, or staff-administered during the care delivery workflow.[44] Several validated instruments, many of which can be integrated into electronic health records, are available to screen for social determinants (Table 5). To assist in selecting an SDOH screening tool, Siren (Social Interventions Research & Evaluation Network) has created an interactive comparison tool. Although there are often common domains across instruments, there are some variations in the domains and methodology for screening. Selection of an instrument may be based on specific SDOHs of interest and local contexts. For example, to support the implementation of the accountable care communities, the AHC-HRSN tool mentioned earlier was adapted from other validated instruments. It focuses on the domains within an existing evidence base and the availability of community resources to address the individual's specific social needs.

Table 5. Examples of Validated Social Determinant of Health Screening Tools

Validated Social Determinant of Health Screening Tools
1. American Community Survey: https://www.census.gov/programs-surveys/acs/
2. The EveryOne project: Advancing health equity in every community, Toolkit by AAFP: https://www.aafp.org/patient-care/social-determinants-of-health/cdhe/everyone-project.html
3. Protocol for Responding to and Assessing Patient Assets, Risks and Experiences (PRAPARE): http://www.nachc.org/wp-content/uploads/2016/09/PRAPARE_Paper_Form_Sept_2016.pdf
4. Social Needs Screening Toolkit, HealthLeads USA: https://healthleadsusa.org/wp-content/uploads/2016/07/Health-Leads-Screening-Toolkit-January-2017_highres.pdf
5. Social Determinants Screening Tool, AccessHealth Spartanburg, CHCS version: http://www.chcs.org/media/AccessHealth-Social-Determinant-Screening_102517.pdf
6. Self Sufficiency Outcomes Matrix, OneCare Vermont, CHCS version: http://www.chcs.org/media/OneCare-Vermont-Self-Sufficiency-Outcome-Matrix_102517.pdf
7. Arizona Self-Sufficiency Matrix: www.mnhousing.gov/get/MHFA_010999/
8. VI-SPDAT: http://file.lacounty.gov/SDSInter/dmh/1022702_CESPacket_v3.0_-05.01.17.pdf
9. CMS Accountable Health Communities Health-Related Social Needs Screening Tool https://innovation.cms.gov/Files/worksheets/ahcm-screeningtool.pdf
SIREN interactive resource to compare SDOH screening tools: https://sirenetwork.ucsf.edu/tools-resources/screening-tools

Source: Institute for Medicaid Innovation. (2019). "Innovations and Opportunities to Address Social Determinants of Health in Medicaid Managed Care."

Once the need is identified, establishing a protocol for coordinating and follow-up must be established. Still, identification of a need and identification of a resource to address the need are only part of the equation. Systems for funding the social intervention must also be established. If there are limitations for the nature of services and interventions that Medicaid may cover, there is an opportunity to consider how regulatory and financing constraints may be overcome to realize benefits to the Medicaid program. There is potential to accomplish this within state (and federal) budgets, with coordination across agencies.[45] This coordination would support blending social and health-related state budgets (e.g., SNAP, Housing, and Medicaid) to meet common goals across state agencies. Alternatively, states could consider pooling funds to create a menu of health- and social-related service options.[46]

State-Led Initiatives that Address Social Needs in Medicaid

In resource-constrained environments, states are considering opportunities to better leverage the information to which they already have access and create greater value and efficiency within their Medicaid programs. Maximizing the regulatory, financial, and convening levers, states are able to support a variety of Medicaid stakeholders in an effort to promote state-level models that better integrate the SDOH information across settings. Approaches are beginning to emerge that anticipate, identify, and address the unmet social needs of Medicaid-covered populations.

North Carolina Department of Health and Human Services

The North Carolina Department of Health and Human Services is leading comprehensive health system reform that supports population health management through the shift from Medicaid fee-for-service to managed care. As part of the shift, care management in the state will provide Medicaid enrollees with access to programs and services that address their social needs.[46] To reach that goal, MCOs contracted by the state are required to adopt standardized social needs screening beginning in mid-2019 as part of their care management strategies. Standardized universal screenings will be required to occur within 90 days of enrollment and will assess food, housing/utilities, transportation, interpersonal safety, and urgent needs. This information will subsequently be shared with enrollees' primary care providers. The MCOs will be required to provide in-person assistance to enrollees with accessing community-based resources—including legal support and housing.

To support efforts to share the Medicaid enrollees' SDOH information, North Carolina is developing an information infrastructure that will be available to public and community-based organizations, in addition to the health care provider community. The information platform will be regularly updated with resources. It is anticipated that this information will flow into the state health information exchange. As part of this initiative, North Carolina is developing a separate platform to collect and warehouse the information that may be utilized across sectors (clinical and social) and providers.

D.C. Positive Accountable Community Transformation (PACT)

In 2016, a coalition was formed in Washington, D.C., to pursue a CMS accountable health community grant. The coalition, known as D.C. Positive Accountable Community Transformation (PACT), aligned itself as a combination of two models – accountable health community and collective impact. Although the grant proposal was unsuccessful in obtaining CMS funding, the stakeholders were committed to the concept and goals of D.C. PACT to advance the health needs of residents and proceeded with the project. D.C. PACT was launched in January 2016 under the guidance of an advisory committee and working group that included core partners that serve and represent different racial/ethnic communities. Partners included hospitals, behavioral health organizations, social service agencies, Medicaid MCOs, food banks, and the D.C. Medicaid agency.

The group coalesced around a common agenda, principles, and goals designed to address large-scale social challenges that do not lend themselves to technical solutions or organizations working alone or along only one point on the continuum. The collective impact approach assumed that all the answers of what to do were not known in advance, and that a continuous cycle of testing, feedback, learning, and community engagement as part of the process would be necessary.

The principles of D.C. PACT:

- Health and social needs are human rights for all D.C. residents who require the equitable and sustainable distribution of resources.
- Partners commit to shared responsibility, accountability, and transparency as necessary components of work performed in the service of health equity and justice.
- Goals and intervention will be data-focused, driven by person-centered outcomes and transformative.
- Work will be coordinated across community services and sectors, resulting in respectful and compassionate care that empowers District residents with the greatest health and social needs.
- Creativity, flexibility, innovation, and vision will be prioritized to determine the coalition's strategic priorities.

Strategic Goals:

- By December 2020, standardize social needs screening citywide.
- Position D.C. PACT as a clearinghouse and hub for health system action to address social needs and improve health equity.
- By December 2020, leverage a bi-directional cloud-based health information exchange to identify the social needs of patients, facilitate high-quality care coordination, and enable staff to provide effective referrals that can be tracked in a standardized process.

- By December 2020, for the highest-risk/cost members, leveraging all information and assessments currently available to address unmet social needs or 90 percent of the target population.

DC PACT members are working toward a recommended, consensus set of screening questions related to housing, mental health, food, employment, and transportation. Upon finalization of the questions, D.C. PACT will establish a protocol for collecting the information and sharing it across systems, including potentially through the District's HIE infrastructure, which will allow for bi-directional access for health, social, and public agencies with the capacity to communicate and track referrals. The system will include all D.C.-operated and –funded programs.

Promising Best Practices in Medicaid MCOs to Address Social Needs

Building on their charter to manage cost, utilization, and quality, Medicaid MCOs continue to evaluate opportunities to improve health service delivery and provide value to the states with which they are contracted. They are continuously exploring new opportunities to leverage their relationship within communities to identify and address the social needs of their covered populations in partnership with other stakeholders. The community investments and partnerships create the potential for MMCOs to, over time, demonstrate improvements in care utilization and ultimately, costs.

Upper Peninsula Health Plan--Connected Communities for Health

Connected Communities for Health (CC4H) is the Upper Peninsula Health Plan's (UPHP's) initiative that aims to address its members' social determinants of health in collaboration with community, state, faith-based, and other non-traditional health care network partners to fulfill their resource needs. Members are screened by customer service representatives for needs in the areas of adult education, childcare, commodities (e.g. household goods/furniture, baby supplies, clothing), employment, finance, food, housing, legal services, transportation, and utility assistance. Utilizing a call-center approach, UPHP has a team of staff-paid interns who serve as CC4H advocates to connect members to resources in their community; reliance on a nontraditional workforce (interns) supports the program model's cost-effectiveness and overall sustainability.

CC4H enables care managers and clinical staff to continue to focus on addressing members' complex medical needs, while teaming with unique community partners to address other issues that affect their health. UPHP relies on a call center model to identify members' resource needs. When a UPHP member calls customer service with a question about his or her plan coverage, customer service concurrently screens the member for any social needs. When a member screens

positive for any need(s), the call is then transferred to the CCH4 advocate desk. Advocates work through the intake and resource connection process to provide members with resource information in their respective geographic location. Four part-time UPHP interns serve as CC4H advocates, which has increased since the program's initial launch in June 2016. Increased screening volume and member-to-member referral via word of mouth prompted increased staffing levels at the desk.

A resource database was established in collaboration with grassroots and non-traditional community health partners such as regional service agencies, community organizations, faith-based institutions, food banks, housing departments, public transit authorities, and state and federal agencies. The resource database includes more than 770 resources that span across the Upper Peninsula of Michigan. Once resource referrals are provided to the member via phone, email, or mail, the CC4H advocate follows up with the member within 10 days of referral to gauge whether the referral(s) met the member's identified needs.

Health Leads is the software platform that enables CC4H Advocates to collect members' information, refer them to community resources, provide effective follow-up, and track resource referral success. The platform's robust reporting and tracking capabilities will enable UPHP to next gauge the impact of assisting members with social determinants and healthcare utilization, clinical outcomes, and cost.

Partnerships

Community hospitals and clinics actively refer members and non-members to the CC4H program. However, only some of the local community-based organizations (CBOs) that broker SDOH resources and services are aware of the CC4H program and actively refer or serve members and individuals. Further collaboration and integration with CBOs, community hospitals, and clinics around shared goals are needed to meet the needs of the population. Better integration between UPHP and its partners is the desired future state to ensure resource availability, appropriate follow-up, and information sharing among partners. Future considerations include a model in which CC4H Advocates are embedded in the clinic or hospital setting to provide resource navigation on a face-to-face basis to members and individuals.

Metrics that are utilized to gauge project impact include:

- Number of unique members served.
- Number of resource referrals.
- Number of successful connections.
- Number of members screened; those screening positive for resource needs, and those screening positive and accepting intake into the CC4H program.
- Top presenting needs by resource category and county.

Member success story:

An Upper Peninsula Health Plan member identified social needs while a Connected Communities for Health Advocate was helping them complete their health risk assessment. The member indicated that she had recently divorced, had two children, and was struggling. Her home did not have walls, heat, or electricity in a few rooms, as her ex-husband had not completed the renovations that were in progress before moving out. The Connected Communities for Health Advocate was able to help her find utility assistance and get additional assistance through Habitat for Humanity to help complete her home renovations. The family's home is now structurally safe.

Lessons Learned:

The ability to roll out Connected Communities for Health on a scalable basis was helpful in testing work-flow processes. Many Plan-Do-Study-Act (PDSA) cycles were utilized in determining the best processes for screening members and connecting them with resources. The program began with one UPHP customer service representative screening. However, one CC4H advocate navigating social resources UPHP eventually added more customer service representatives to conduct screenings and hired additional interns to work as advocates once they could adequately assess call-center volume, utilization, and appropriate advocate caseload.

Although the focus on the SDOH and their apparent relationship to health statuses is getting stronger, it is important that CBOs representing community, state, faith-based, and other non-traditional health care network partners participate in the development of SDOH integration strategies. As healthcare providers increase focus on their population's social needs, careful coordination with CBOs will be critical to ensure capacity and resource availability to address a growing consumer base. Support is needed at the state level to provide awareness and education about the role of CBOs' SDOH and physical health, which must be supported on the state-level.

Mercy Care Comprehensive Community Health Program

Mercy Care's Comprehensive Community Health Program (CCHP) is a whole health navigation support service for members with mental health/substance use disorders, who are likely to remain in crisis if not actively engaged in treatment services and if underlying social factors are not met. The program is supported in partnership with La Frontera/EMPACT, Community Bridges, Inc. (CBI), City of Phoenix, and the United Way, which currently offer a full continuum of services to meet the potential needs of identified target populations while also allowing for a "no wrong door approach."

The community partners were involved throughout the development and implementation process. This regular and consistent involvement in the program development led to early buy-in, successful program design, identification and removal of potential barriers, and a strengthened professional network. As such, the partners were able to establish long-term support for CCHP. For instance, the City of Phoenix paired 275 housing choice voucher subsidies with this program, allowing Mercy Care to create opportunities for community integration and living opportunities.

Additional steps taken to improve community engagement included:

- Identifying influential community champions;
- Regular communication on program process and outcomes; and
- Involving the provider community to endorse this model of care.

This innovative model set out to not only address member's health issues and improve health and cost outcomes, but also to improve quality of life for those served through this program. It recognized that for individuals to reach optimum health, access to safe, affordable housing is critical.

As a health plan that serves as the Regional Behavioral Authority for Maricopa County, Mercy Care increasingly examines ways to meet the needs of its members with mental illness and substance use disorders through accessing mainstream affordable housing resources. As part of the CCHP program, members can receive case management, transportation, crisis support, mentoring, counseling services, advocacy, housing subsidies, and life skills. In addition, via CBI, members may access medication-assisted therapy (MAT) treatment medications and ambulatory detoxification.

Members were identified for participation in the program if they had high inpatient utilization, frequent interactions with emergency first responders, inadequate or at-risk living environments, lack of social supports, chronic medical conditions, and a high risk of recidivism because of untreated behavioral health concerns. Populations include both adult men and women who are not currently receiving supports through the Mercy Care system and are either active or eligible under Title 19.

The CCHP program and staff members have contributed to a positive impact on members within the community and an associated cost savings. During the previous fiscal year, there was a 28 percent reduction in hospitalizations and 33 percent reduction of crisis services utilization among CCHP participants. Mercy Care is currently in discussion with the City of Phoenix to explore opportunities to expand the number of subsidies paired with this program.

In the future, Mercy Care will work to optimize funding streams and establish consistent resources for this program, as previous funding through the City of Phoenix was repurposed. To ensure that previously established support services continue unimpeded, Mercy Care will provide funding in partnership with the other organizations.

Barriers

Although having the potential to house 275 members helped make this a truly comprehensive program, the length of time associated with searching for and securing affordable housing continues to be a barrier. This barrier is not exclusive to this program but represents a more-global issue. The highly trained and skilled CCHP outreach teams have served as the driving force to connect members to housing. The subsidies are near full capacity, and housing retention has remained steady.

Looking Ahead: Implications for the Future

Under increasing budget constraints, state Medicaid agencies and their managed care organization partners are constantly in search of opportunities to improve the quality and value of care provided to individuals covered by Medicaid. Although there is increasing focus on the role of social determinants on health care and outcomes, more needs to be done to create systems to address unmet social needs. Early examples provide insight into the need for collaboration across the health and social services systems to identify effective opportunities to expand the capacity to improve population health. Further exploration is needed into models that address how information is collected, stored, shared, and used to help address the needs of vulnerable individuals. A range of clinical, research, and policy priorities may be considered to move towards a system that better integrates health care treatment with social interventions as applicable.

Clinical Priorities

Standardize social determinants of health information
Several tools are available to collect information about social risk factors; however, there is some variation across tools. Elements should be standardized and included in national standards, such as the Healthcare Effectiveness Data and Information Set (HEDIS), to support assessment and performance across health plans and other health care organizations. Risk-adjustment strategies for social determinants should be considered as part of performance measurement and quality improvement approaches.

Explore alternative care delivery approaches.
Although the importance of unmet social needs is known, additional exploration is needed to define the role of clinicians in the collection and utilization of this information. To address social determinants, the composition of care teams may need to be adjusted to improve support of enrollees with unmet social needs. Also, care delivery models may need to focus on trauma-informed-care approaches that promote sensitivity to individuals' experiences and circumstances. As such, care teams may require education and training about trauma-informed approaches. Using an empathy-based approach during the screening process may help to elicit information about social factors that may affect the health care and outcomes of the enrollee/patient.

Identify strategies to target at-risk populations.

To provide the upstream focus on social determinants, MMCOs and other health care providers need to identify the portion of their enrollee/population base to target. In addition to screening approaches, consideration of complex populations and enrollees with high expenditures may serve as a proxy to identify unmet need. Predictive analysis strategies might be useful tools to identify primary needs and potential opportunity to address with social interventions.

Research Priorities

Identify sustainable funding sources to address social determinants of health.

Research is needed to assess the capacity of the limited resources of the Medicaid program to address both health and social needs within its covered populations. Research is needed to identify financially sustainable models to support efforts that address social determinants of health for the Medicaid population. Further, additional research is needed that explores the redistribution of resources once health savings are achieved through implementation of social interventions.

Determine the valuation of social intervention strategies that provide the most value.

Research is needed to further establish the return on investment in relation to costs and health outcomes; with an assessment of efficacy of interventions for addressing the social determinants of health. This research could determine methodologies for quantifying the value of social interventions and the costs associated with delivering distinct units of interventions.

Policy and Advocacy Priorities

Establish an evidence-based, nationally standardized screening tool and quality metrics.

Although Medicaid MCOs are well positioned to screen for social needs among their members, there may be an opportunity to standardize the tools that are used for data collection, the identification of appropriate frequency for screening, and quality metrics that measure impact over time. Tools vary in the domains assessed and in the methodologies for collection and reporting. Policymakers may choose to standardize elements for screening and reporting to provide information about unmet need that may be leveraged across systems, regions, or states.

Identify strategies to fund social interventions that have an impact on health outcomes.

Policymakers may consider different opportunities for creating sustainable funding streams for non-traditional evidence-based services and supports. Currently, many social service organizations are unable to obtain direct Medicaid payment, although they may provide a related benefit to health care delivery, outcomes, and costs for Medicaid-covered individuals. Policymakers could help establish billing mechanisms to provide direct payment for services independent of grant funding. State programs may also Implement Medicaid fee schedules for Z codes to incentivize collection; payments could be risk-adjusted based on identified unmet need.

Policymakers may also explore other opportunities to leverage MMCO contracts to establish specific goals for covered populations. For example, contracts could specify population health goals,

implementation strategies, partnership requirements, or coordination approaches. There could be opportunities for additional flexibilities within managed care to address social needs. The managed care regulations increased the capacity for MMCOs to provide nonmedical support, however, as state Medicaid programs and MMCOs increase screening for social determinants, they may identify additional approaches to address unmet health needs that would require policy clarification and approvals.

Also, if medical expenditures are reduced as MMCOs address unmet social needs, long-term rate-setting strategies will be needed.

Support multi-stakeholder engagement to successfully integrate social interventions strategies

Create coordinated systems for referral, follow-up, and data sharing by building coalitions of stakeholders and partners across the health and social services spectrum. A shared vision and platform for person-centered care and support could reduce the silos between organizations and lead to better integration of clinical care with social support. State Medicaid agencies could play a key role in convening relevant stakeholders to build a shared vision and data-sharing platform.

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Reviewers

Prior to publication of the final report, the Institute for Medicaid Innovation sought input from independent clinical, scientific, and policy experts as peer reviewers who do not have any financial conflicts of interest.

However, the conclusions and synthesis of information presented in this report does not necessarily represent the views of individual peer reviewers or their organizational affiliation(s).

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