Preliminary Comments Development Team (PCDT) Presentation:

An Overview of Proposals Submitted to the Physician-Focused Payment Model Technical Advisory Committee (PTAC) That Included Components Related to Social Determinants of Health (SDOH) and Equity and Other Highlights from Background Information

Jay S. Feldstein, DO (Lead)
Lauran Hardin, MSN, FAAN
Angelo Sinopoli, MD
Jennifer L. Wiler, MD, MBA

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The content in this presentation was sourced from the following documents: *Background Information Related to Optimizing Efforts to Address Social Determinants of Health (SDOH) and Equity in the Context of Alternative Payment Models (APMs) and Physician-Focused Payment Models (PFPMs),* and *Overview of Social Determinants of Health (SDOH) and Equity in the Context of Alternative Payment Models (APMs) and Physician-Focused Payment Models (PFPMs).*

Introduction

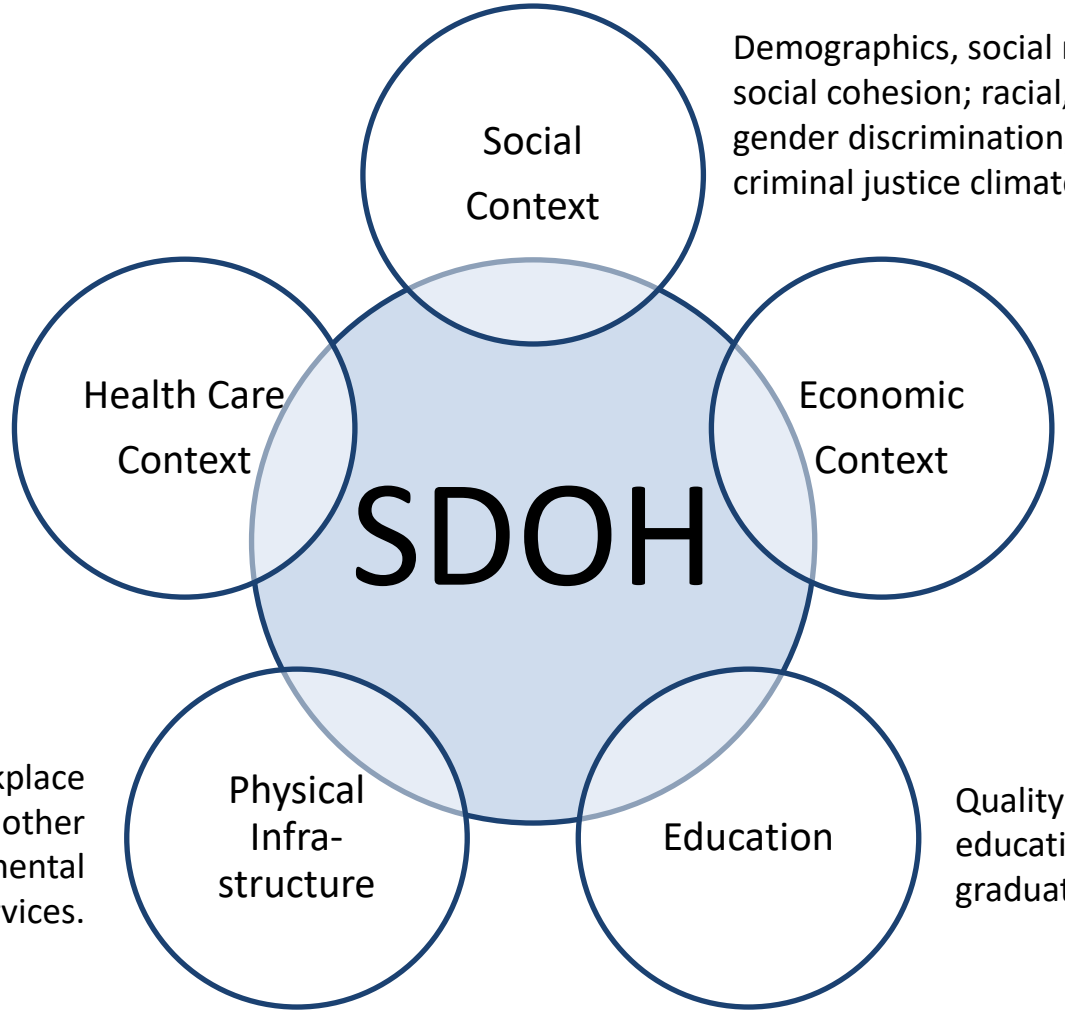
- From 2016 to 2020, PTAC received 35 stakeholder-submitted proposed physician-focused payment models (PFPMs).
  - 9 included components related to SDOH
    - 5 of these also described strategies for advancing equity in access to care
  - 4 did not explicitly focus on SDOH but addressed equity in some way
- This presentation provides a summary of the characteristics of the 9 proposed models that included components related to SDOH, with a focus on proposed:
  - Activities and functions related to addressing SDOH and/or equity
  - Performance measures for activities related to addressing SDOH and/or equity
  - Payment approaches for accounting for and/or reimbursing for activities related to SDOH and/or equity
- This presentation also includes some additional background information on definitions and other issues related to SDOH and equity.

Background: Defining SDOH, Social Needs, and Behavioral Health

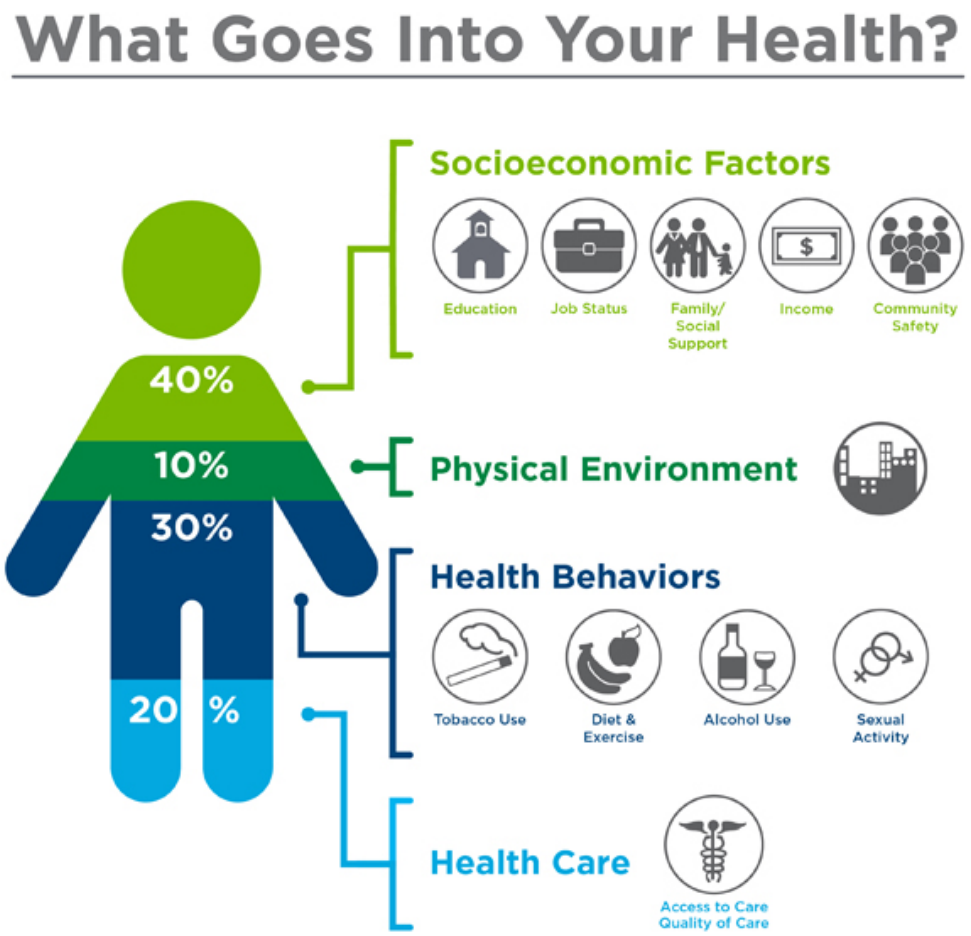
- **SDOH**:
  - Community-level barriers patients can face to becoming and staying healthy (although experienced by individuals, exist at the community level) (AHRQ, 2020)
    - Key areas: 1) social context; 2) economic context; 3) education; 4) physical infrastructure; and 5) health care context
- **Health-related social needs (HRSNs)** as related to but different from SDOH:
  - Non-medical patient needs that impact health (such as housing instability, food insecurity, and exposure to interpersonal violence) *
- **Behavioral health** needs of patients within the context of addressing physical wellness, SDOH, and HRSNs:
  - Umbrella term that includes mental health and substance abuse conditions, life stressors and crises, stress-related physical symptoms, and health behaviors. Behavioral health conditions often affect medical illnesses (AHRQ Academy).

*Source: Billioux, A., Verlander, K., Anthony, S., & Alley, D. Standardized Screening for Health-Related Social Needs in Clinical Settings: The Accountable Health Communities Screening tool. Accessed August 5, 2021, from https://nam.edu/wp-content/uploads/2017/05/Standardized-Screening-for-Health-Related-Social-Needs-in-Clinical-Settings.pdf.

Background: SDOH Key Areas in AHRQ's Definition



Background: Relative Importance of Medical and Non-Medical Determinants of Health



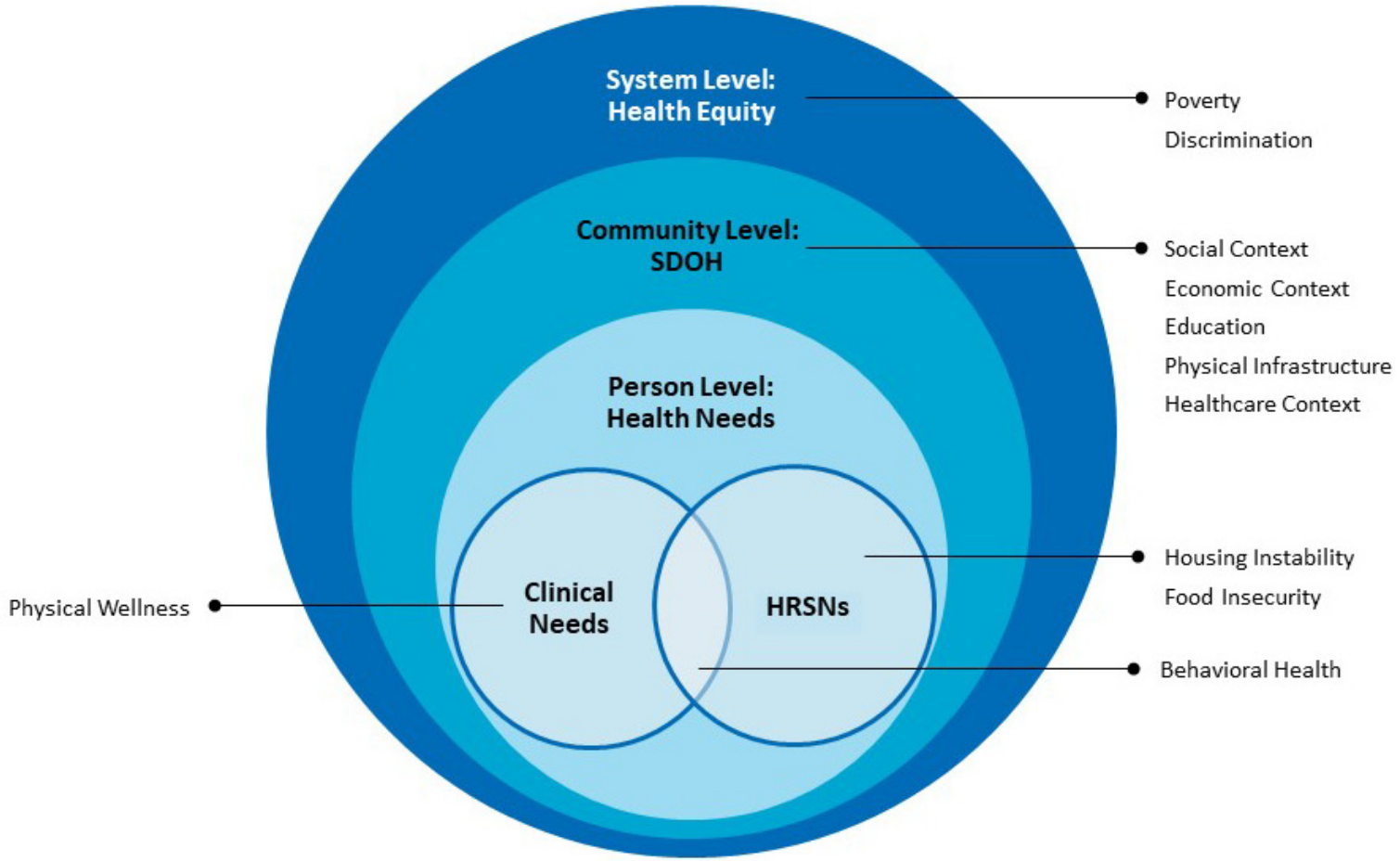
Note: Genetic factors were not included in estimates.

Source: Hussein, T., & Collins, M. (2016). The Community Cure for Health Care. Retrieved from https://ssir.org/articles/entry/the_community_cure_for_health_care

Background: Defining Health Equity and Health Disparities

- **Health equity**:
  - Achieved when every person has the opportunity to "attain his or her full health potential" and no one is "disadvantaged from achieving this potential because of social position or other socially determined circumstances" (CDC, 2020)
- **Health disparities** as related to but different from equity:
  - "A particular type of health difference that is closely linked with social, economic, and/or environmental disadvantage. Health disparities adversely affect groups of people who have systematically experienced greater obstacles to health based on their racial or ethnic group; religion; socioeconomic status; gender; age; mental health; cognitive, sensory, or physical disability; sexual orientation or gender identity; geographic location; or other characteristics historically linked to discrimination or exclusion"(Healthy People 2020).

The Relationship between Health Equity, SDOH, and HRSNs



Background: Examples of Effective Interventions for Addressing SDOH and/or Equity

- Efforts to address SDOH can assist in improving equity and reducing health disparities.
- Examples of broad interventions that have been found to be effective in addressing SDOH:
  - Supportive community-based behavioral interventions.
  - Anti-poverty interventions.
  - Interventions targeting environmental conditions (e.g., smoke-free space policies have improved respiratory health and smoking behaviors).
- Effective interventions for addressing SDOH that are relevant for health care providers include efforts to address patients' health care contexts and help them deal with unmet social needs. For example:
  - **Culturally and linguistically competent care and education** have improved chronic disease outcomes, psychosocial outcomes, cardiovascular risk factors, self-reported behavioral outcomes, and patient and provider behaviors.
  - **Transportation services** embedded in multi-component interventions involving patient navigation and chronic disease education have reduced unnecessary emergency department visits.

Background: Examples of Effective Interventions for Addressing SDOH and/or Equity, cont.

- Some health care providers have collected data on patients' SDOH and HRSNs and used this information to assist in referring patients to additional resources to address these needs.
  - During the COVID-19 pandemic, some health care providers with the ability to screen and refer individuals to community-based organizations (CBOs) were able to assist COVID-19 patients in isolating at home by providing resources such as food.
- Several programs have been effective in addressing HRSNs among the Medicare population.
  - Studies have shown that seniors participating in an affordable housing program experienced fewer hospitalizations and used the emergency room less frequently.
  - Studies have also shown that assistance primarily provided to alleviate food insecurity can result in reduced cost-related medication nonadherence, hospitalizations, emergency department visits, and overall health care costs.

The Impact of the COVID-19 Public Health Emergency on the Use of Data Related to SDOH and/or Equity

- While telehealth use increased during COVID-19, research has highlighted disparities in access to telehealth.
- Some state and local health departments started reporting COVID-19 outcomes data by race/ethnicity, identifying disparities (e.g., Michigan).
- State and local health departments, health care organizations, and researchers used SDOH-related data to predict community risk for COVID-19, including:
  - UCSF's Health Atlas
  - Socially Determined's tool SocialScape helped Maryland plan for localized COVID-19 care.
  - MITRE's COVID-19 Healthcare Coalition Dashboards
- Health care organizations used SDOH-related data to improve care coordination.
  - For example, early in the COVID-19 pandemic, Humana's use of SDOH-related data in its care coordination formed the impetus for its Basic Needs Food Program.
- The Robert Wood Johnson Foundation launched a new collaboration between the Health Care Cost Institute (HCCI), CareJourney, the Berkeley Research Group, and a network of health systems to "create an open COVID-19 patient data registry network."

Incorporation of SDOH and/or Equity in Proposals Submitted to PTAC

PTAC Proposals with an SDOH and/or Equity Component

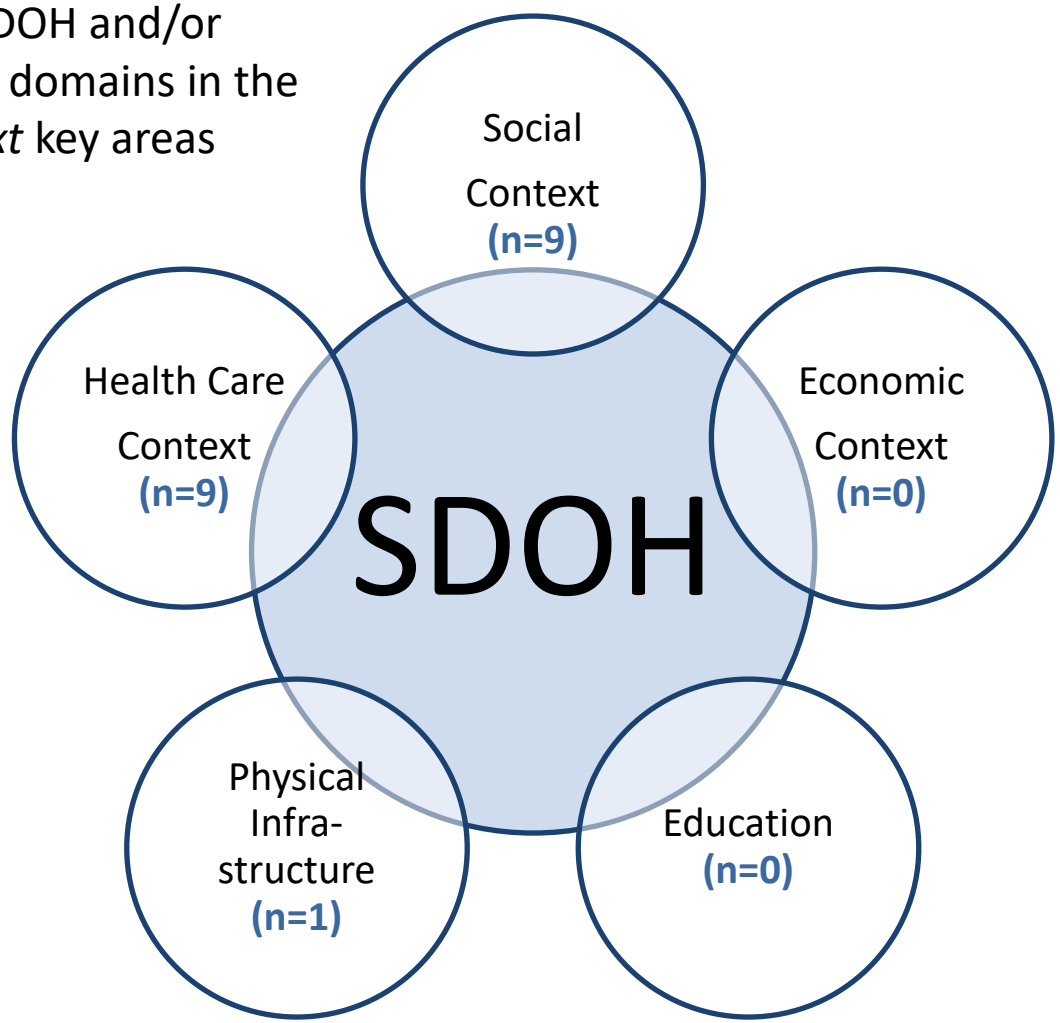
- 9 proposals that were submitted to PTAC included components related to SDOH.*
  - 5 of these proposed models also described strategies for advancing equity in access to care.
- The 9 PTAC proposals that were identified as having an SDOH and/or equity component varied by clinical focus, setting of care, and care coordination context.

Clinical Focus**	Clinical Setting
Primary Care (n=3)	Primary/Specialty Care Practices (n=5)
Specialty Care (n=2)	Hospital-Based Outpatient Clinics (n=1)
Oncology-Related Care (n=2)	Patient Home (n=3)
Chronic or Advanced Illness (n=2)	
Functional Care (n=1)	

*These proposals were identified using SDOH-based keyword searches of key documents related to the Committee's proposal review process.
**The numbers in parentheses do not add up to 9 because some proposals were linked to more than one area of clinical focus.

SDOH Key Areas Covered in Proposals Submitted to PTAC

All 9 PTAC proposals that included SDOH and/or equity components addressed some domains in the *health care context* and *social context* key areas identified by AHRQ.



SDOH-Related Functions in Proposals Submitted to PTAC

- Each of the 9 PTAC proposals that included SDOH and/or equity components addressed at least 4 SDOH-related functions.
- The most common SDOH-related functions are summarized below:
  - Screening for HRSNs (n = 4)
  - Providing referrals to address HRSNs (n = 7)
  - Monitoring progress and following up on identified HRSNs (n = 9)
  - Improving integration of health care and social services and supports (n = 8)
  - Using interdisciplinary teams to address HRSNs (n = 4)
  - Engaging in SDOH-based performance measurement (n = 2)
  - Providing a patient-centered care experience (n = 2)
  - Sharing information with CBOs on clinical and non-clinical factors that contribute to health and success of treatment (n = 1)

Note: More information about the strategies, performance measures, and payment methodologies used in these PTAC proposals can be found in the appendix to these slides.

Additional Background Information

Examples of CMMI Models with an SDOH and/or Equity Component

- 15 CMMI models were identified as including an SDOH and/or equity component.
  - Accountable Health Communities (AHC)
  - Community-based Care Transitions Program (CCTP)‡
  - Community Health Access and Rural Transformation (CHART)
  - Comprehensive Primary Care Plus (CPC+)
  - Independence at Home (IAH) Demonstration‡
  - Integrated Care for Kids (InCK)
  - Maryland All-Payer (MD All-Payer)
  - Maryland Total Cost of Care (MD TCOC)‡
  - Medicare Coordinated Care Demonstration (MCCD)‡
  - Multi-payer Advanced Primary Care Practice (MAPCP)
  - Next Generation ACO (NGACO)‡
  - Oncology Care Model (OCM)‡
  - Pioneer ACO Model (Pioneer ACO)‡
  - State Innovation Models (SIM) Initiative
  - Vermont All-Payer ACO
- All but one of the 15 CMMI models (InCK) included Medicare beneficiaries as a target population, and half of these models targeted Medicare beneficiaries exclusively (indicated in blue and with a "‡" above).

*These models were identified using SDOH-based keyword searches of key documents related to the Committee's proposal review process.

Examples of CMMI Models with an SDOH and/or Equity Component, cont.

- Each of the 15 CMMI Alternative Payment Models (APMs) addressed at least 2 of the 5 SDOH domains identified in AHRQ's definition.
- The 15 CMMI models targeted a diverse range of HRSNs, and the most common social needs addressed were:
  - Transportation problems (n=10)
  - Food insecurity (n=9)
  - Housing instability (n=6)
- Nearly all of the CMMI models (n=13) included a mental health component, and two-thirds of the models (n=10) addressed substance use.
- Six CMMI models also addressed needs related to physical wellness by empowering patients to lead a healthy lifestyle (for example, by engaging in physical activity and weight management).

Results from CMMI Model Evaluations Related to SDOH and/or Equity*

- 12 of the 15 CMMI models with SDOH and/or equity components have undergone evaluations.
  - Many evaluations reported an increase in screenings for HRSNs and provider modifications to accommodate access to care issues resulting from non-medical factors (i.e., transportation or schedule-related issues).
  - The IAH Demonstration, offering home-based primary care, reported high satisfaction by both patients and caregivers regarding the model's effect on care accessibility.
  - Some participating hospitals used data from screenings and population-level characteristics to open resource centers or training programs to address SDOH.
  - A common evaluation finding was that participants in these models increased the number of social workers and other community service staff.
- Common challenges identified by evaluators include:
  - Lack of sufficient financial resources and personnel to provide patient-centered, value-based care on a large scale.
  - Resource and financial challenges are intensified in rural settings and in historically disadvantaged communities.

* These findings are based on third-party evaluations done by CMMI's contractors.

Performance Measures in CMMI Models Related to Measuring the Effectiveness of Initiatives Related to SDOH and/or Equity

- 5 of the 15 selected CMMI models that included SDOH and/or equity components included performance measures related to SDOH and/or equity.
- Performance measures varied in scope:
  - General performance measures, like those specified in the AHC Model, looked for an increase in community capacity to respond to HRSNs.
  - Models with specific measures, like the CPC+ Model, gathered data on the percentage of practices reporting after-hours services and the use of telehealth to expand access to care.
  - Certain practices in some models (e.g., OCM and Maryland All-Payer Model) included performance metrics in provider contracts in order to improve accountability and motivate physicians and other care providers.
- The MAPCP Demonstration stratified health service utilization data by race, income, geographic location, and other socioeconomic factors underpinning SDOH and health-related disparities.

Current State of Evidence on the Effectiveness of SDOH Interventions Relevant for APMs*

- Successful patient-level interventions implemented by health care providers to address HRSNs related to patients' health care contexts (based on AHRQ's SDOH definition) often included:
  - Provision of culturally and linguistically competent care and education.
  - Improved financial access to care.
  - Improved communication, navigation, and self-management.
- Health care providers are also well-positioned to assist their patients in accessing community-based benefits and support services. Many interventions addressing other HRSNs (e.g., transportation barriers, housing, and food needs) have been shown to have positive impacts on health outcomes.
- Health care providers could also engage with local, community leaders to advocate for policies and interventions toward addressing SDOH. Examples of such policies/interventions include wage increases and improving environmental conditions.

*Williams, M. V., Perez, L., Siddiqi, S., Qureshi, N., Sousa, J., and Huntington, A. *Building the Evidence Base for Social Determinants of Health Interventions*. 2021. Manuscript in preparation. *This research was funded by the U.S. Department of Health and Human Services Office of the Assistant Secretary for Planning and Evaluation under Contract Number HHSP233201500038I and carried out by RAND Health Care.*

Trends in the Use of SDOH and/or Equity Data for Reimbursement

- At the federal level:
  - CMMI has designed and implemented multiple APMs that address SDOH and/or equity (e.g., Accountable Health Communities).
  - As of 2019, Medicare Advantage plans are permitted to expand "health-related" supplemental benefits to include services such as meal delivery and transportation assistance.
  - Medicare's value-based purchasing programs do not currently include health equity measures to reduce beneficiary disparities.
- At the state level:
  - Section 1915 Medicaid waivers designed to cover home-based care.
  - Section 1115 Medicaid demonstration waivers (e.g., NC's Healthy Opportunities Pilots, CA's CalAIM Program).
  - Medicaid managed care organizations engaging in activities to address SDOH (e.g., AmeriHealth Caritas, CareSource).
- Commercial insurers:
  - Creation of SDOH indices (e.g., Aetna).
  - However, to date progress incorporating SDOH and/or equity has been limited.

Areas Where Additional Information Is Needed

- How has the COVID-19 public health emergency increased attention on efforts to address SDOH and advance health equity?
- What activities can help to optimize efforts to address SDOH and/or equity in APMs and PFPMs to improve quality and reduce or control costs? Which activities are particularly effective for Medicare beneficiaries?
- What kinds of data are needed to enhance health care providers' ability to address SDOH and/or equity issues?
- How can APMs and PFPMs incentivize providers to screen for and make referrals to address SDOH issues?
- How can APMs and PFPMs improve their measurement of the quality and effectiveness of SDOH- and/or equity-related efforts (including assessing the impact of community partnerships related to addressing these issues)?
- How can APMs and PFPMs move beyond individual interventions focused on HRSNs to addressing community-wide interventions focused on SDOH and access to care?
- How can APMs and PFPMs address the structural and systemic factors that cut across SDOH domains and contribute to health disparities?

Appendix on SDOH and/or Equity Components in Proposals Submitted to PTAC

PTAC Proposals with an SDOH and/or Equity Component

- 9 proposals that were submitted to PTAC included components related to SDOH.*
  - 5 of these proposed models also described strategies for advancing equity in access to care.
- These 9 proposals were submitted by the following stakeholders:
  - American College of Physicians and the National Committee for Quality Assurance (ACP-NCQA)
  - American Society of Clinical Oncology (ASCO)
  - Coalition to Transform Advanced Care (C-TAC)
  - Jean Antonucci, MD (Antonucci)
  - Johns Hopkins School of Nursing and the Stanford Clinical Excellence Research Center (Hopkins-Stanford)
  - Large Urology Group Practice Association (LUGPA)
  - New York City Department of Health and Mental Hygiene (NYCDOHMH)
  - Personalized Recovery Care (PRC)

* These proposals were identified using SDOH-based keyword searches of key documents related to the Committee's proposal review process.

Strategies Supporting SDOH and/or Equity Objectives in Proposals Submitted to PTAC

- 5 of the 9 PTAC proposals that included SDOH and/or equity components described general strategies for advancing equitable access to health care by reducing barriers to access, participation, and engagement in the care delivery process, such as:
  - Patient-centered care protocols with attention to cultural competency (Antonucci, Hopkins/Stanford)
  - Targeting underserved populations with limited access to treatments (LUGPA)
  - Broadening model availability to cover populations irrespective of condition or socioeconomic background (C-TAC)
- 1 proposal (Antonucci) provided specific information on the types of social and/or behavioral health needs that would be addressed by the proposed model.
- 5 proposals noted physical wellness needs of patients, most commonly related to diet and physical activity.

Performance Measures for Activities Related to SDOH and/or Equity in Proposals Submitted to PTAC

- Only Dr. Antonucci's proposal included a specific mention of performance measures related to SDOH and/or equity:
  - A *How's Your Health?* (HYH) survey that would be administered to patients asks about limitations faced in social activities or social support.*
  - Patients indicating limitations would be asked to describe specific social factors including health habits, financial status, and behavioral factors including stress, emotional problems, and exposure to community or domestic violence.
- The AAFP proposal, while not providing specific metrics, encouraged using SDOH data where possible in generating clinically actionable performance reports.

* The HYH survey is a validated patient survey with five domains: pain, emotional issues, medical complexity (polypharmacy), medication side effects, and health care confidence. SDOH-specific questions are captured under medical complexity (polypharmacy). The HYH survey provides risk adjustment scores for patients based on responses. Patients input data on the howsyourhealth.org website, and practice-wide data may be aggregated in the online platform.

Payment Methodologies for Activities Related to SDOH and/or Equity in Proposals Submitted to PTAC

- All 9 of the proposals with SDOH and/or equity components included risk adjustment for clinical factors, with 5 specifically adjusting for social risk factors (AAFP, ACP-NCQA, ASCO, Antonucci, Hopkins/Stanford).
  - Only Dr. Antonucci's proposal included specific examples of social risk factors: limitation in social activities, limitation in social support, stress and emotional concerns, exposure to violence, and financial status.
- These 9 proposals varied widely in how they structure payments to reimburse for activities related to SDOH and/or equity.
  - The most common payment mechanism was per beneficiary per month (PBPM) payments reimbursing providers for SDOH and/or equity functions (in some cases referrals to social workers).
  - Monthly or quarterly capitated payments were specified by AAFP, ACP-NCQA, ASCO, and Antonucci.
  - AAFP and Antonucci included performance-based payments evaluating providers on SDOH and/or equity-related measures.
  - AAFP included population-based payments.

Key Characteristics of the 9 PTAC Proposals with SDOH and/or Equity Components

Abbreviated Submitter Name	Clinical Focus	Setting	Payment Mechanism	SDOH, Equity, and Behavioral Health Model Objectives and Requirements
AAFP	Primary care	Primary care practices	Per Beneficiary Per Month (PBPM)	Seeks to address HRSNs, and providers are required to make referrals to social services
ACP-NCQA	Primary and specialty care integration	Primary and specialty care practices	Fee for service (FFS) or reduced FFS with prospective payments; monthly care management fee	Proposed risk stratification is meant to improve equity of access. Proposed model also mandates adherence to Patient-Centered Specialty Practice (PCSP) criteria.
ASCO	Oncology	Oncology specialty practices	Care Management fee; Two-track FSS; performance-based payments	Proposed risk stratification takes HRSNs into account.
C-TAC	Advanced illness	All advanced illness care sites, including the home	Risk-adjusted PBPM; performance-based bonus	Intends to apply to broad range of advanced illness beneficiaries, regardless of condition or socio-economic background.
Antonucci	Primary care	Primary care practices	Monthly risk-adjustment capitated payments; performance-based payments	SDOH metrics incorporated into risk adjustment, promoting access.
Hopkins - Stanford	Home health, functional care for elders	Home	Bundled payment with performance bonus; moving toward capitated model	Addresses home-bound patients' functional needs and emphasizes cultural competency in health care to increase quality of life for older adults.
LUGPA	Urology / Oncology	Urology and multispecialty practices	Month care management fee; performance-based payment	Seeks to introduce an equitable uptake of Active Surveillance (AS) to reduce disparity in AS utilization based on socioeconomic status.
NYCDOHMH	Multispecialty, hepatitis C infection management	Hospital-based outpatient clinics	Outpatient bundled payment with opportunity for shared savings	Attempts to address HRSNs to support beneficiaries' ability to achieve optimal well-being.
PRC	Internal Medicine	Home	Bundled payment comprised of risk payment and per-episode payment	Attempts to address HRSNs to support beneficiaries' ability to achieve optimal well-being.

SDOH-Related Functions of the 9 PTAC Proposals with SDOH and/or Equity Components

Abbreviated Submitter Name	Screening for HRSNs (n=9)	Providing referrals to address HRSNs (n=7)	Monitoring progress and following up on identified HRSNs (n=9)	Engaging in SDOH-based performance measurement (n=2)	Supporting and sharing information on factors that contribute to health and success of treatment (n=1)	Using interdisciplinary teams to address HRSNs (n=4)	Improving integration of health care and social services and supports (n=8)	Providing a patient-centered care experience (n=2)
AAFP	✓	✓	✓	✓	✓		✓	
ACP-NCQA	✓	✓	✓				✓	
ASCO	✓	✓	✓				✓	
C-TAC	✓*	✓	✓			✓	✓	
Antonucci	✓		✓	✓				✓
Hopkins - Stanford	✓*	✓	✓			✓	✓	✓
LUGPA	✓*	✓	✓				✓	
NYCDOHMH	✓	✓	✓			✓	✓	
PRC	✓	✓	✓			✓	✓	

*There was no explicit mention of screening in the proposal, but it was assumed that providers were screening for unmet needs given the mention of referrals and monitoring processes.

SDOH Key Areas and Social, Behavioral Health, and Physical Wellness Needs Targeted by the 9 PTAC Proposals with SDOH and/or Equity Components

Abbreviated Submitter Name	AHRQ SDOH Key Areas Being Addressed	Targeted Social Needs	Targeted Behavioral Health Needs	Targeted Physical Wellness Needs
AAFP	Health care context, social context	Not specified	Not specified	General lifestyle choices (not specified further)
ACP-NCQA	Health care context, social context	Not specified	Not specified	Obesity prevention/weight management
ASCO	Health care context, social context	Not specified	Not specified	Diet
C-TAC	Health care context, social context	Not specified	Not specified	Diet
Antonucci	Health care context, social context	Financial strain	Mental health (stress), psychosocial conditions, interpersonal safety (exposure to domestic and community violence), network of social and emotional support	Diet, physical activity
Hopkins - Stanford	Health care context, physical infrastructure, social context	Not specified	Not specified	Not specified
LUGPA	Health care context, social context	Not specified	Not specified	Not specified
NYCDOHMH	Health care context, social context	Not specified	Not specified	Not specified
PRC	Health care context, social context	Not specified	Not specified	Not specified

Payment Mechanisms of the 9 PTAC Proposals with SDOH and/or Equity Components

Abbreviated Submitter Name	PBPM payments intended to cover SDOH-related activities, among others (n=7)	Performance-based payments, with participants evaluated on SDOH- and/or equity-Related Measures (n=2)	Monthly or quarterly capitated payments (n=4)	Population-based payments (n=1)	FFS payments as a reimbursement mechanism, with additional payments or payment flexibilities to cover SDOH-related activities, among others (n=0)	Upfront or one-time initial payment to cover SDOH-related activities, among others (n=0)	Payments that are risk-adjusted for clinical risk factors (n=9)	Payments adjusted for social risk factors (n=5)
AAFP	✓	✓	✓	✓			✓	✓
ACP-NCQA			✓				✓	✓
ASCO	✓		✓				✓	✓
C-TAC	✓						✓	
Antonucci		✓	✓				✓	✓
Hopkins - Stanford	✓						✓	✓
LUGPA	✓						✓	
NYCDOHMH	✓						✓	
PRC	✓						✓	

Appendix on SDOH and/or Equity Components in CMMI Models

Key Characteristics of the 15 CMMI Models with SDOH and/or Equity Components

CMMI Model	Clinical Focus	Setting	Payment Mechanism
AHC	Primary, specialty, and behavioral care	Multiple (e.g., hospitals, clinical delivery sites, primary care practices)	Model funds support the needs of bridge organizations, and do not pay directly or indirectly for any community services.
CCTP*	Care transitions	Inpatient and outpatient settings, home	FFS; CBOs paid an all-inclusive rate per eligible discharge.
CHART	Primary care	Primary care practices	Upfront funding, capitated payments, and benefit enhancements; two-sided risk arrangements for ACOs
CPC+	Primary care	Primary care practices	PBPM; FFS; quarterly payments; performance-based payments
IAH Demonstration**	Chronic illness	Home	FFS; performance-based payments
InCK	Physical and behavioral pediatric health	Multiple (e.g., inpatient and outpatient settings, pediatric care practices)	State-specific APMs
Maryland All-Payer Model	Primary and specialty care	Hospital – inpatient and outpatient settings	All-payer system with annual global budget; incentive payments
Maryland TCOC	Care transitions, palliative care, primary care, community-based care, and emergency care	Multiple (e.g., hospitals, primary care practices, non-hospital service providers)	Annual global budget paid by FFS; population-based payments, incentive- & performance-based payments; PBPM payments
MCCD***	Chronic illness	Varies by organization	Monthly PBPM payments
MAPCP Demonstration****	Primary care	Multiple (e.g., hospitals, home, community-based locations)	PBPM payments that vary by state
NGACO	Primary and specialty care	Multiple (e.g., hospitals, primary care practices)	FFS; FFS plus additional PBPM payments; population-based payments; capitation
OCM	Cancer	Outpatient	Episode payments; PBPM payment, performance-based payments
Pioneer ACO Model	Primary and specialty care	Multiple (e.g., hospitals, primary care practices)	Shared savings/losses payment model; population-based payments
SIM Initiative	Multiple (e.g., primary care, acute care, behavioral health, palliative care)	Multiple (e.g., hospitals, primary care practices)	Most states include some form of value-based payment; some states use episode-payments; some states use PBPM payments or FFS models.
Vermont All-Payer ACO Model	Primary and specialty care	Multiple (e.g., hospitals, primary care practices)	FFS; FFS plus additional PBPM payment; population-based payments; capitation; start-up funding provided by CMS

*Was created by Section 3026 of the Patient Protection and Affordable Care Act. **Was enacted by Section 3024 of the Patient Protection and Affordable Care Act.
***Was authorized by Section 4016 of the Balanced Budget Act of 1997. ****Was conducted under the authority of Section 402 of the Social Security Amendments of 1967.

Key Characteristics of the 15 CMMI Models with SDOH and/or Equity Components

CMMI Model	SDOH, Equity, and Behavioral Health Model Objectives and Requirements
AHC	Address beneficiary HRSNs through screening, referral, and navigation services, as well as through quality improvement, data-driven decision-making, and care coordination. In addition to care quality, apply above-mentioned tactics to reduce inpatient and outpatient health care use and total costs.
CCTP	Unspecified
CHART	Enhance beneficiaries' access to care by ensuring rural providers remain financially sustainable and are able to offer services that address SDOH.
CPC+	Requirements for practices include: ensure access to care, help patients navigate care system, educate patients about their conditions and how to manage them, and develop capacity to address behavioral and HRSNs.
IAH Demonstration	Lower costs of care while improving quality through home-based care to chronically ill and functionally limited Medicare beneficiaries.
InCK	Identify and treat children with behavioral health needs. Integrate care coordination and case management across physical health, behavioral health, and other community/social services for children with health needs influencing their functioning at school, home, and in their community.
Maryland All-Payer Model	Unspecified
Maryland TCOC	Decrease opioid and other drug overdose deaths. Decrease avoidable hospital admissions and disparities in hospital readmissions. Maryland Primary Care Program, which falls under the broader Maryland TCOC Model, offers the CPC+ program to Maryland residents and includes the same objectives as the CPC+ program (see CPC+ above for details).
MCCD	Unspecified
MAPCP Demonstration	Expand access to advanced primary care (i.e., value-based care).
NGACO	Unspecified
OCM	Improve access to patient-centered care.
Pioneer ACO Model	Unspecified
SIM Initiative	Varied by state, but common objectives include: improve population health, which included reducing health disparities; reduce spending by populations with behavioral health conditions; improve integration of physical and behavioral health.
Vermont All-Payer ACO Model	Improve health outcomes and care quality in relation to substance use disorder (SUD) and suicides. Expand access to quality care. ACOs required to make investments in SDOH.

SDOH-Related Functions of the 15 CMMI Models with SDOH and/or Equity Components

CMMI Model	Screening for HRSNs (n=12)	Providing referrals to address HRSNs (n=12)	Monitoring progress and following up on identified HRSNs (n=7)	Engaging in SDOH-based performance measurement (n=5)	Supporting and sharing information on factors that contribute to health and success of treatment (n=6)	Using interdisciplinary teams to address HRSNs (n=8)	Improving integration of health care and social services and supports (n=8)	Providing a patient-centered care experience (n=8)
AHC	✓	✓	✓	✓		✓	✓	
CCTP	✓	✓			✓	✓		
CHART								
CPC+	✓	✓	✓	✓	✓			✓
IAH Demonstration						✓		✓
InCK	✓	✓	✓		✓	✓	✓	✓
Maryland All-Payer Model	✓	✓	✓	✓			✓	✓
Maryland TCOC	✓	✓				✓		✓
MCCD	✓	✓					✓	
MAPCP Demonstration	✓	✓	✓	✓			✓	✓
NGACO	✓	✓			✓	✓		✓
OCM	✓	✓	✓		✓			✓
Pioneer ACO Model	✓	✓	✓			✓	✓	
SIM Initiative	✓	✓		✓	✓		✓	
Vermont All-Payer ACO Model						✓	✓	

SDOH Key Areas and Social Needs Targeted by the 15 CMMI Models with SDOH and/or Equity Components

CMMI Model	AHRQ SDOH Key Areas Being Addressed					Targeted Social Needs
	Economic Context	Education	Health Care Context	Physical Infrastructure	Social Context	
AHC	✓	✓	✓	✓	✓	Education, employment, financial strain, food insecurity, housing instability, linguistic barriers, physical activity, transportation problems, utility needs
CCTP			✓	✓		Food insecurity, transportation problems
CHART			✓	✓		Health care context, housing instability, transportation problems
CPC+	✓		✓		✓	Financial strain, food insecurity, housing instability, transportation problems, utility needs
IAH Demonstration			✓	✓		Transportation problems
InCK	✓	✓	✓	✓	✓	Education, financial strain, food insecurity, housing instability, interpersonal safety, linguistic barriers, transportation problems
Maryland All-Payer Model	✓		✓	✓		Employment, housing instability
Maryland TCOC			✓	✓		Food insecurity
MCCD	✓		✓	✓		Financial strain, food insecurity, transportation problems
MAPCP Demonstration			✓	✓		Transportation problems
NGACO			✓	✓		Not specified
OCM			✓	✓	✓	Food insecurity, transportation problems
Pioneer ACO Model			✓	✓		Not specified
SIM Initiative	✓	✓	✓	✓	✓	Education, employment, food insecurity, housing instability, transportation problems
Vermont All-Payer ACO Model			✓	✓		Not specified

Behavioral Health and Physical Wellness Needs Targeted by the 15 CMMI Models with SDOH and/or Equity Components, cont.

CMMI Model	Targeted Behavioral Health Needs	Targeted Physical Wellness Needs
AHC	Interpersonal safety, mental health, network of social and emotional support, psychosocial conditions, substance use	Not specified
CCTP	Not specified	Physical activity
CHART	Not specified	Not specified
CPC+	Mental health, interpersonal safety, network of social and emotional support	Not specified
IAH Demonstration	Mental health	Not specified
InCK	Adverse childhood experiences, mental health, network of social and emotional support, psychosocial conditions, substance use	Not specified
Maryland All-Payer Model	Mental health, substance use, other unspecified behavioral and psychiatric health needs	Not specified
Maryland TCOC	Mental health, substance use	Diet, physical activity, diabetes prevention and management, obesity prevention/weight management
MCCD	Interpersonal safety, mental health, psychosocial conditions, substance use	Diet, physical activity, obesity prevention/weight management
MAPCP Demonstration	Mental health, substance use	Diet, physical activity, diabetes prevention and management, obesity prevention/weight management
NGACO	Mental health, substance use	Not specified
OCM	Mental health, network of social and emotional support, psychosocial conditions, substance use	Not specified
Pioneer ACO Model	Mental health, other unspecified behavioral health needs	Diet, physical activity, obesity prevention/weight management
SIM Initiative	Mental health, network of social and emotional support, psychosocial conditions, substance use	Diet, diabetes prevention and management, obesity prevention/weight management, general promotion of healthy lifestyles
Vermont All-Payer ACO Model	Mental health, psychosocial conditions, substance use	Not specified

Payment Mechanisms of the 15 CMMI Models with SDOH and/or Equity Components

CMMI Model	PBPM payments intended to cover SDOH-related activities, among others (n=10)	Performance-based payments, with participants evaluated on SDOH- and/or equity-Related Measures (n=4)	Monthly or quarterly capitated payments (n=4)	Population -based payments (n=6)	FFS payments as a reimbursement mechanism, with additional payments or flexibilities to cover SDOH-related activities, among others (n=5)	Upfront or one-time payment to cover SDOH- related activities, among others (n=3)	Payments adjusted for clinical risk factors (n=5)	Payments adjusted for social risk factors (n=2)
AHC		✓*						
CCTP	✓		✓	✓		✓	✓	✓
CHART					✓	✓		
CPC+					✓			
IAH Demonstration								
InCK	✓	✓						
Maryland All-Payer Model	✓			✓			✓	✓
Maryland TCOC	✓						✓	
MCCD	✓						✓	
MAPCP Demonstration	✓							
NGACO	✓		✓	✓	✓			
OCM	✓	✓						
Pioneer ACO Model				✓				
SIM Initiative	✓	✓	✓	✓	✓	✓	✓	
Vermont All-Payer ACO Model	✓		✓	✓	✓			

*Participants in the AHC model are bridge organizations responsible for linking beneficiaries with community services intended to address HRSNs. Many types of organizations serve as bridge organizations, including health systems, hospitals, nonprofits, health information technology providers, academic institutions, payers, and public health agencies. Funds for this model support the linking activities of bridge organizations; funds do not cover the actual costs associated with the community services to which beneficiaries are linked.