CAPTURING SOCIAL & BEHAVIORAL DOMAINS & MEASURES IN ELECTRONIC HEALTH RECORDS: PHASE 2

This document showcases the core domains and measures that constitute an efficient panel, which the committee recommends for inclusion in all electronic health records.

Patient electronic health records (EHRs) provide crucial information to providers treating individual patients, to health systems addressing the health of populations, and to researchers uncovering valuable details on determinants of health and the effectiveness of treatments. Over the past few decades, substantial empirical evidence points to the contribution of social and behavioral factors—such as living conditions and physical activity levels—to functional status and the onset and progression of disease. Research and interventions on social and behavioral determinants of health have largely fallen under the purview of public health, and until recently, these determinants have not been linked to clinical practice or health care delivery systems.

An Institute of Medicine committee was convened to conduct a two-phase study to identify domains and measures that capture the social and behavioral determinants of health to inform the development of recommendations for meaningful use of EHRs. In its Phase 1 report, the committee identified the 17 social and behavioral domains that are the best candidates to be considered in all EHRs. Criteria also were developed to identify which domains and measures should be included in all EHRs. *Capturing Social and Behavioral Domains and Measures in Electronic Health Records: Phase 2* pinpoints 12 measures related to 11 of the selected domains and considers the implications of incorporating them into all EHRs.

CORE DOMAINS & MEASURES WITH SUGGESTED FREQUENCY OF ASSESSMENT

DOMAIN/MEASURE	MEASURE	FREQUENCY
Alcohol use	3 questions	Screen and follow up
Race and ethnicity	2 questions	At entry
Residential address	1 question (geocoded)	Verify every visit
Tobacco use & exposure	2 questions	Screen and follow up
Census tract-median income	1 question (geocoded)	Update on address change
Depression	2 questions	Screen and follow up
Education	2 questions	At entry
Financial resource strain	1 question	Screen and follow up
Intimate partner violence	4 questions	Screen and follow up
Physical activity	2 questions	Screen and follow up
Social connections & social isolation	4 questions	Screen and follow up
Stress	1 question	Screen and follow up

NOTE: Domains and measures are listed in alphabetical order; domains/measures in the shaded area are currently frequently collected in clinical settings; domains/measures not in the shaded area are additional items not routinely collected in clinical settings.

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FINDINGS &
RECOMMENDATIONS

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Four social and behavioral domains of health are already frequently collected in clinical settings. The value of this information would be increased if standard measures were used in capturing these data.	The Office of the National Coordinator for Health Information Technology and the Centers for Medicare & Medicaid Services should include in the certification and meaningful use regulations the standard measures recommended by this committee for four social and behavioral domains that are already regularly collected: race/ethnicity, tobacco use, alcohol use, and residential address.
The addition of selected social and behavioral domains, together with the four domains that are already routinely collected, constitute a coherent panel that will provide valuable information on which to base problem identification, clinical diagnoses, treatment, outcomes assessment, and population health measurement.	The Office of the National Coordinator for Health Information Technology and the Centers for Medicare & Medicaid Services should include in the certification and meaningful use regulations addition of standard measures recommended by this committee for eight social and behavioral domains: educational attainment, financial resource strain, stress, depression, physical activity, social isolation, intimate partner violence (for women of reproductive age), and neighborhood median household income.
Standardized data collection and measurement are critical to facilitate use and exchange of information on social and behavioral determinants of health. Most of these data elements are experienced by an individual and are thus collected by self-report. Currently, EHR vendors and product developers lack harmonized standards to capture such domains and measures.	The Office of the National Coordinator for Health Information Technology's electronic health record certification process should be expanded to include appraisal of a vendor's or product's ability to acquire, store, transmit, and download self-reported data germane to the social and behavioral determinants of health.
The addition of social and behavioral data to EHRs will enable novel research. The impact of this research is likely to be greater if guided by federal prioritization activities.	The Office of the Director of the National Institutes of Health (NIH) should develop a plan for advancing research using social and behavioral determinants of health collected in electronic health records. The Office of Behavioral and Social Science Research should coordinate this plan, ensuring input across the many NIH institutes and centers.
Advances in research in the coming years will likely provide new evidence of the usefulness and feasibility of collecting social and behavioral data beyond that which is now collected or recommended for addition by this committee. In addition, discoveries of interventions and treatments that address the social and behavioral determinants and their impact on health may point to the need for adding new domains and measures. There is no current process for making such judgments.	The Secretary of Health and Human Services should convene a task force within the next three years, and as needed thereafter, to review advances in the measurement of social and behavioral determinants of health and make recommendations for new standards and data elements for inclusion in electronic health records. Task force members should include representatives from the Office of the National Coordinator for Health Information Technology, the Center for Medicare & Medicaid Innovation, the Agency for Healthcare Research and Quality, the Patient-Centered Outcomes Research Institute, the National Institutes of Health, and research experts in social and behavioral science.

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