



The Journey to a Healthier Wisconsin – Early adopters – Tales from the Trenches

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Agenda

- Welcome
- Purpose of the SDOH Collaborative
- Definition of Z code
- Brief Overview of January 26 (Webinar 1)
- Overview of Presentation: Bellin Health SDOH Journey
- Q&A

Purpose of the SDOH Collaborative

- WHA-helping to address patients' social needs
- Robust data related to patients' social needs is critical
- Standardized approach to document and code social needs will enable WI hospitals to track, aggregate and identify opportunities to improve the health of our communities
- ICD-10-CM CMS/AHA SDOH diagnosis codes (Z55-Z65)

- Timeframe: January 2022-October 2022
- Selection Criteria: Wisconsin residents: 837 Inpatient claims and ED claims data
- Data Sources:
 - WHAIC 837 Claims data
 - Health Equity Organizational Assessment (HEOA) responses

CMS Framework for Health Equity: 10 – Year Plan

The Five Health Equity Priorities for Reducing Disparities in Health

Priority 1: Expand the collection, reporting, and analysis of standardized data

Priority 2: Assess causes of disparities within CMS programs and address inequities in policies and operations to close gaps

Priority 3: Build capacity of health care organizations and the workforce to reduce health and health care disparities

Priority 4: Advance language access, health literacy, and the provision of culturally tailored services

Priority 5: Increase all forms of accessibility to health care services and coverage

Z Codes



Social Determinants of Health ICD-10 Codes

Z55-Z65



ICD-10-CM Diagnosis Codes

History, status, or problem that may affect health

Contact with health services



Developed by the World Health Organization (WHO)

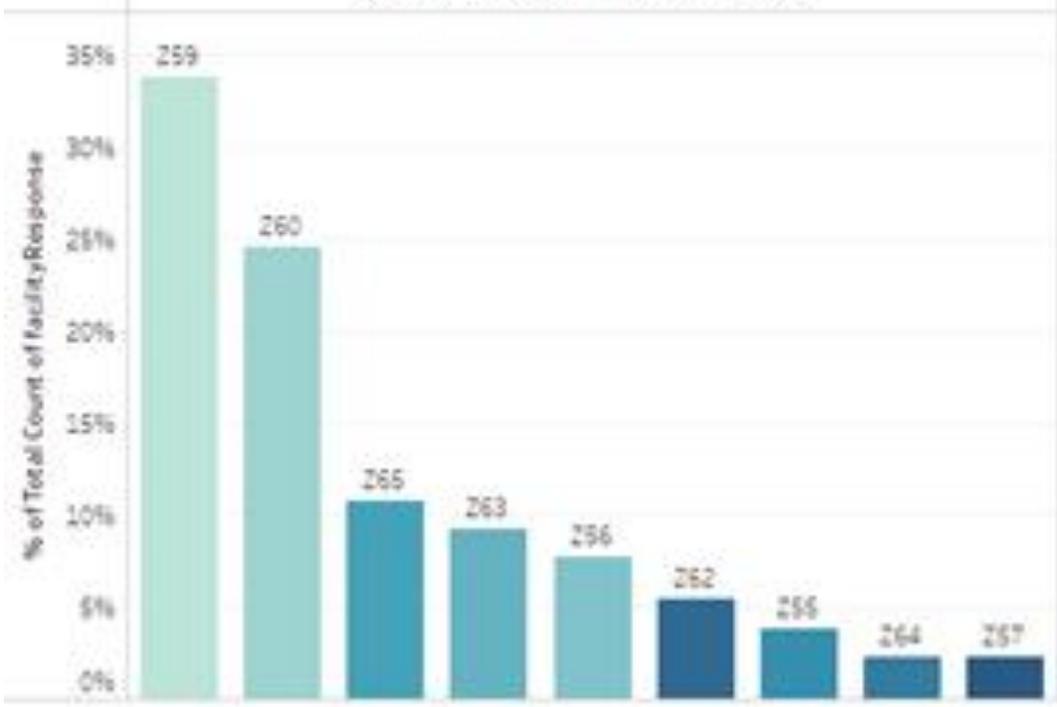


Allow better specificity to your community and patients served

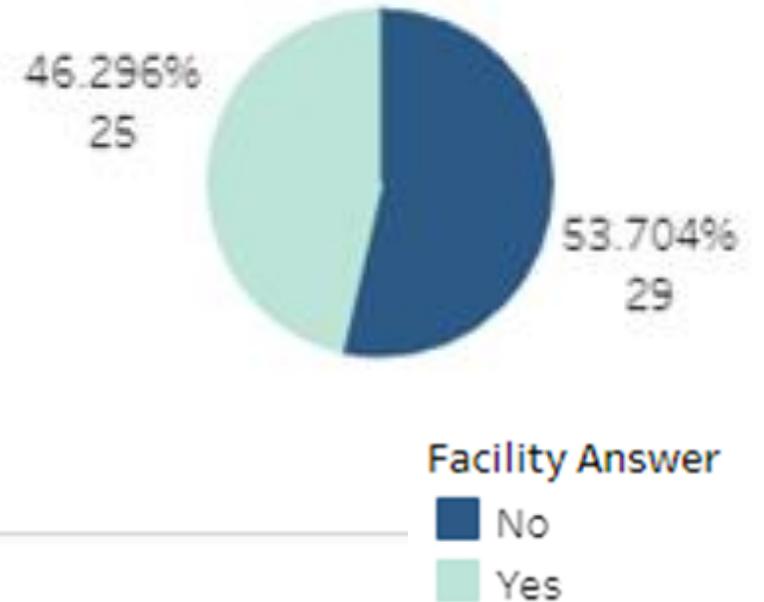
ICD-10-CM Code Category	Problems/Risk Factor Included in Category
Z55 – Problems related to education and literacy	Illiteracy, schooling unavailable, underachievement in a school, educational maladjustment and discord with teachers and classmates.
Z56 – Problems related to employment and unemployment	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, toxic agents 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 due to 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.

HEOA Survey Responses - Member Priorities

19. Please select the top three SDOH Z code categories that are your hospital's highest priorities:



16. Are you currently assigning Z-codes to SDOH data? SDOH-related Z codes ranging from Z55-Z65 are the ICD-10-CM encounter reason codes used to document SDOH data (e.g., housing, food insecurity, transportation, etc.).



Connecting patients to community resources



Connecting patients to local community resources in your area:

- Foodbanks, nonprofit programs (help paying bills, transportation services, work and housing info).
- [NowPow](#) (integrated in EPIC)
 - Community referral platform
 - Help people know where to go
 - Improves staff productivity
- Aunt Bertha (Social Care Network)
 1. [Findhelp.org](#)
 2. More directory focused
 3. Find assistance using zip code

Presentation:

Intro: Jordan Kerscher of Bellin Health

SOCIAL DETERMINANTS OF HEALTH

JORDAN KERSCHER
POPULATION HEALTH OPERATIONAL LEAD

LEADERSHIP BUY-IN

Mission

In partnership, we enable every person and community in our region to achieve and maintain their full health and **well-being** potential through our relentless commitment to quality, experience and affordability.

The Best Care

Bellin Health aims to increase years of quality life by providing the highest quality, reliable care that is innovative, equitable, coordinated and affordable for everyone. Through collaborative relationships, **we will address the social determinants of health** to positively impact the health and well-being of our patients and communities.

TIMELINE

Feb 2018 – Multi-disciplinary team began developing SDOH screening strategy

Feb 2019 – SDOH screening pilot for adults began

April 2019 – All primary care clinics live

Feb 2020 – Began designing questions and screening workflow for adolescents

Nov 2020 – Adolescent pilot began

April 2021 – All primary care clinics live on adolescent screening workflow

June 2021 – Began designing questions and screening workflow for children age 0-12

Dec 2021 – 0-12 pilot began

THREE AGE GROUPS

- Caregiver Education and Work
- Child Education
- Financial Resource Strain
- Food Insecurity
- Housing
- Physical Activity
- Safety and Environment
- Screen Time
- Transportation

Child
Age 0-12

- Alcohol
- Depression
- Housing
- Intimate Partner Violence
- Peer Relationships
- Physical Activity
- Safety and Environment

Adolescent
Age 13-17

- Alcohol
- Daily Stress
- Depression
- Financial Resource Strain
- Food Insecurity
- Housing
- Intimate Partner Violence
- Physical Activity
- Post-Partum Depression
- Social Connections
- Tobacco
- Transportation

Adult
Age 18 and older

WORKFLOW

SDOH questionnaire is completed in primary care on an annual basis as part of well child, physicals, Medicare wellness, and new patient visits

- MyChart
- Tablet
- Paper

During check-in, front desk staff is able to see if questionnaire has been completed prior to visit



Care teams can identify SDOH risks at a glance in their visit

SOCIAL DETERMINANTS

RESOURCES

Custom SmartSet that contains resources for each SDOH domain

Organized by Patient Education, System Resources, and Community Resources

BLN SDOH Resources [Manage User Versions](#)  

▶ Alcohol

▶ Financial Resource Strain

▼ Food Insecurity

▶ Diagnosis Codes [Click for](#)

▼ Patient Education for After Visit Summary - English

Eating Healthy on a Budget

Food Insecurity Information

▼ Patient Education for After Visit Summary - Spanish

Eating Healthy on a Budget

Food Insecurity Information

▼ System Resources

Case Management Referral

Nutrition Referral

▼ Community Resources - Edit Before Signing - English

Food Community Resources - Edit: Select County (1)

▼ Community Resources - Edit Before Signing - Spanish

Food Community Resources- Edit: Select County (1)

▶ Housing

▶ Intimate Partner Violence

Z Codes

▼ Food Insecurity

▼ Diagnosis Codes

- Food insecurity [Z59.41]
- Lack of access to adequate food [Z59.48]
- Lack of adequate food and safe drinking water [Z59.48, Z58.6]

▼ Patient Education for After Visit Summary - English

Providers are able to add Z codes to the visit diagnosis as they're choosing the appropriate resource from the SmartSet

Adult

SDOH Screening Metrics



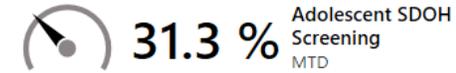
	Dec 21	Jan	Feb	Mar	MTD
SDOH Screening	37.8 %	38.4 %	39.2 %	40.0 %	40.7 %
SDOH Missed Opportunities	42.6 %	41.1 %	39.6 %	37.8 %	36.8 %

SDOH At Risk Metrics

	Dec 21	Jan	Feb	Mar	MTD
Alcohol Risk	24.4 %	24.0 %	23.8 %	23.1 %	22.9 %
Daily Stress Risk	27.5 %	27.3 %	27.3 %	27.3 %	27.3 %
Financial Resource Strain Risk	9.7 %	9.6 %	9.6 %	9.6 %	9.6 %
Food Insecurity Risk	5.0 %	4.9 %	4.8 %	4.8 %	4.8 %
Housing Risk	5.0 %	5.1 %	5.1 %	5.0 %	5.1 %
Intimate Partner Violence Risk	0.7 %	0.6 %	0.5 %	0.5 %	0.5 %
Physical Activity Risk	64.6 %	64.5 %	64.6 %	64.7 %	64.8 %
Social Connections Risk	19.1 %	19.0 %	19.0 %	19.1 %	19.3 %
Transportation Risk	1.5 %	1.5 %	1.5 %	1.5 %	1.4 %

Pediatric

Adolescent SDOH Screening Metrics



	Dec 21	Jan	Feb	Mar	MTD
Adolescent SDOH Screening	25.7 %	26.4 %	28.1 %	30.0 %	31.3 %
Adolescent SDOH Missed Opportunities	61.7 %	60.0 %	57.9 %	55.5 %	54.0 %

Adolescent SDOH At Risk Metrics

	Dec 21	Jan	Feb	Mar	MTD
Adolescent Alcohol Risk	4.8 %	5.0 %	4.9 %	5.0 %	5.0 %
Adolescent Housing Risk	7.9 %	7.9 %	8.1 %	8.3 %	8.6 %
Adolescent Intimate Partner Violence Risk	0.0 %	2.6 %	6.5 %	7.8 %	9.6 %
Adolescent Peer Relationships Risk	28.4 %	28.5 %	29.2 %	29.7 %	30.3 %
Adolescent Physical Activity Risk	43.0 %	43.3 %	43.4 %	43.8 %	43.8 %
Adolescent Safety and Environment Risk	21.2 %	20.3 %	20.7 %	20.7 %	20.6 %

Childhood SDOH Screening Metrics

	Dec 21	Jan	Feb	Mar	MTD
Childhood SDOH Screening	1.9 %	3.9 %	5.8 %	8.6 %	10.3 %
Childhood SDOH Missed Opportunities	96.6 %	77.9 %	76.8 %	73.0 %	71.4 %

Childhood SDOH At Risk Metrics

	Dec 21	Jan	Feb	Mar	MTD
Childhood Caregiver Education and Work Risk	23.7 %	24.0 %	24.4 %	21.5 %	19.9 %
Childhood Education Risk	47.3 %	51.0 %	50.3 %	50.3 %	46.9 %
Childhood Financial Resource Strain Risk	9.4 %	9.9 %	10.3 %	10.3 %	10.7 %
Childhood Food Insecurity Risk	6.1 %	5.9 %	6.3 %	7.1 %	7.3 %
Childhood Housing Risk	9.6 %	8.8 %	8.3 %	8.1 %	7.7 %
Childhood Physical Activity Risk	30.0 %	35.5 %	37.4 %	37.6 %	37.8 %
Childhood Safety and Environment Risk	13.0 %	10.8 %	10.6 %	12.4 %	12.6 %
Childhood Screen Time Risk	17.1 %	51.3 %	52.1 %	51.8 %	52.3 %
Childhood Transportation Risk	1.3 %	1.1 %	1.5 %	1.6 %	1.7 %

SDOH COMPOSITE SCORE

SDOH Composite Score is a custom risk score that calculates the total number of adult domains that are identified as medium or high risk.

- Alcohol
- Daily Stress
- Depression
- Financial Resource Strain
- Food Insecurity
- Housing
- Intimate Partner Violence
- Physical Activity
- Post-Partum Depression
- Social Connections
- Tobacco
- Transportation

Adult
Age 18 and older

Score = 3



KEY TAKEAWAYS

Quality Impact

As scores increased, performance in key quality measures went down

ED and Hospital

As scores increased, ED visits and hospital admissions increased

Critical Domains

Transportation
Food Insecurity
Financial Resource Strain

Score 5+

Patients with a score of 5 or more should be considered high risk and receive a person as a resource

Ultimately the score validated that we are asking the right questions and highlighted the fact that we need to continue reinforcing the importance of our workflows with our care teams so that SDOH becomes a priority in our visits.

LESSONS LEARNED

- Need organizational support and a multi-disciplinary team to develop a screening tool
- Start slow, not every visit
- Must have resources to offer for each domain
- Provider buy-in is critical to success
- Monitor results and use the data to understand the needs of your population

Q & A

Thank you!

Future Webinar Series dates:

July 27

October 26