Health Equity Performance Measures Toolkit:

A Guide for Local Health Departments

NACCHO SM
National Association of County & City Health Officials

School of Public Health
University of Minnesota
Center for Public Health Systems

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About CPHS

The Center for Public Health Systems (CPHS) at the University of Minnesota School of Public Health (UMN-SPH) was established in 2021 to support public health practitioners and public health systems using evidence-based research. CPHS improves the health of the people of Minnesota and the nation through technical assistance, research, and evaluation services. Its mission is to support governments, organizations, and communities using evidence-based public health practices and generate new evidence about public health systems. CPHS partnered with Jessica Owens Young at American University to create this toolkit.

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Executive Summary

In mid-2021, the Centers for Disease Control and Prevention (CDC) awarded approximately $2.25 billion to 108 recipients as part of its *National Initiative to Address COVID-19 Health Disparities Among Populations at High-Risk and Underserved, Including Racial and Ethnic Minority Populations and Rural Communities* (OT21-2103) grant. Under this initiative, local health departments (LHDs) received funding to enhance their capacity and capability to address health disparities related to COVID-19. In 2023, the National Association of County and City Health Officials (NACCHO) funded the Center for Public Health Systems (CPHS) at the University of Minnesota School of Public Health to increase LHDs capacity to define, measure, and track progress toward health equity as a part of their performance improvement.

Performance measures are indicators that are used to create performance standards, which can be used to track and assess performance as a part of performance management or quality improvement processes. This toolkit is informed by: 1) an environmental scan of peer-reviewed literature and plans written by public health departments with goals or strategies to advance health equity, 2) listening sessions with LHD personnel, and 3) the National Association of County and City Health Officials (NACCHO) *Measuring What Matters in Public Health* guide (2018).

Health Equity Performance Measurement Toolkit

TOOLKIT OVERVIEW

Who This Toolkit Is For

This toolkit is for all LHDs who are interested in learning more about performance measures and how they can support LHD health equity initiatives. This toolkit is especially appropriate for public health professionals at LHDs who are curious about health equity performance measures (HEPM) but have not yet taken steps to design HEPM, or who are in the beginning steps of designing performance measures to assess progress and support improvement in health equity programs and initiatives at their LHD. Other public health professionals, such as those working at state health departments, nonprofits, and foundations, can also benefit from engaging with this toolkit.

WHAT THIS TOOLKIT DOES

This toolkit aims to do the following:

- Introduce LHDs and public health professionals to performance measures related to health equity.
- Outline steps LHDs can take to create and track performance measures, including methods and criteria to use when designing performance measures.
- Provide examples of performance measures from existing LHD health equity plans.
- Expand understanding of data to inform performance measures to include qualitative data.

WHAT THIS TOOLKIT DOES NOT DO

This toolkit does not aim to:

- Provide a comprehensive collection of performance measures.
- Dictate which performance measures must or should be included as a part of an LHD's health equity performance management approach.
- Provide a comprehensive overview of evaluation techniques to assess performance measures progress.

HOW TO USE THIS TOOLKIT

Figure 1 below presents the seven HEPM steps and what is accomplished in each step that are discussed in this toolkit.

Step 1 Preparation for Health Equity Performance Measures	• Assessing LHD's readiness to engage in health equity performance measures
Step 2 Assessing Health Equity Priorities and Populations	• Understanding Key Concepts in Health Equity and considerations for measuring health equity • Identifying racial/ethnic health inequities to target
Step 3 Building a Model to Develop Health Equity Performance Measures	• Designing performance measures for assessing health equity progress in priority areas/populations • Using logic models to identify performance measures across short-, medium- and long-term outcomes
Step 4 Data for Developing Health Equity Performance Measures	• Identifying or collecting health equity data • Establishing criteria for selecting health equity performance measures
Step 5 Analytical Methods and Tracking of Performance Measurement	• Identifying and selecting analytic methods • Tracking health equity performance measures over time
Step 6 Making Adjustments	• Asking process-oriented questions to see if adjustments to implementation should be made
Step 7 Disseminating Results for Accountability	• Disseminating health equity information and progress

Figure 1. Health Equity Performance Measurement Steps and Activities.

Overview of Health Equity

A History of Inequities

In 2003, the Institute of Medicine (IOM) (now the National Academy of Medicine) released its landmark report Unequal Treatment: Confronting Racial and Ethnic Disparities in Health Care.[2] Two decades ago, we knew that racial and ethnic health care inequities were pervasive and our efforts to collect data were "unsystematic and inadequate to monitor the quality of care provided to racial and ethnic minorities."[2] Recommendations for data collection and monitoring from this report are shown in the image to the right.

Where Are We Today?

The annual 2023 National Healthcare Quality and Disparities Report includes data through 2021 (two years during the COVID-19 pandemic) and summarizes key findings specifically for Quality Trends and Disparities.[3] In March 2023, the symposium on "*Unequal Treatment at 20: Accelerating Progress Toward Health Care Equity*" noted that **many barriers to racial equity remain** and that "No single intervention will mitigate against health care inequity; rather, comprehensive strategies that engage affected communities as full partners in system redesign are needed."[4] In **Appendix A**, we highlight some of the leading organizations that focus on advancing health equity.

*This toolkit will focus on **racial/ethnic health disparities** in access to resources that shape health.*

Race/Ethnicity Data

There is widespread consensus that the use of race/ethnicitydata is integral to advancing health equity.[2, 5–7] The ability of organizations to identify and address disparities hinges on effective collection of demographic data. Barriers to collecting race/ethnicity data are generally non-legal and include limited resources or staffing at the public health department, insufficient standards for data collection and coding, hesitancy to provide data, and failure of providers to report data, etc.[8]

Scope of This Toolkit

In this toolkit, we focus on topics related to race/ethnicitysuch as language, country of origin, immigration status (foreign-born vs. born on U.S. soil), cultural groups, etc. LHDs may have access to this data already and are in a position to develop targeted health promotion outreach activities for communities. Please note that in this toolkit, we follow scientific precedent and define race as a social construct and not a biological one.[9,10] In sharing information about racial/ethnic health disparities and HE, we want to emphasize that it is racism itself and not race or ethnicity that shapes health outcomes and drives health disparities.[11] Communicating that racism drives racial and ethnic disparities is an important lens and framework for measurement and communities.[12]

UNEQUAL TREATMENT

Racial and ethnic minorities tend to receive a lower quality of healthcare than non-minorities, even when access-related factors, such as patients' insurance status and income, are controlled. The sources of these disparities are complex, are rooted in historic and contemporary inequities, and involve many participants at several levels, including health systems, their administrative and bureaucratic processes, utilization managers, healthcare professionals, and patients… A comprehensive, multi-level strategy is needed to eliminate these disparities.

Data Collection and Monitoring

Recommendation 7-1

Collect and report data on health care access and utilization by patients' race, ethnicity, socioeconomic status, and where possible, primary language.

Recommendation 7-2

Include measures of racial and ethnic disparities in performance measurement.

Recommendation 7-3

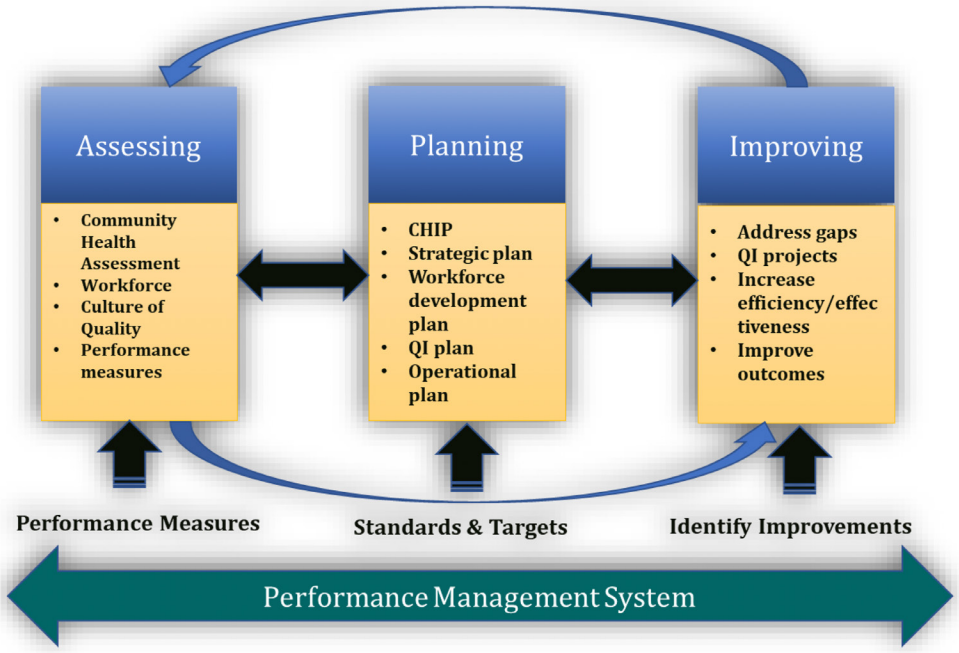
Monitor progress toward the elimination of healthcare disparities.

Recommendation 7-4

Report racial and ethnic data by OMB categories but use subpopulation groups where possible.

Overview of Health Equity Performance Measurement

Performance measures are indicators that are used to create performance standards, which can be used to track and assess performance as a part of performance management or quality improvement processes. Performance measures can be applied to health equity-related activities, outputs, and outcomes. Depending on your goals, performance measures can be designed to assess progress at all stages of a program, project, or initiative, such as short-term, mid-term, and long-term outcomes. Performance measures can also be a tool to support tracking capacity and processes.



Source: National Association of County & City Health Officials. Measuring What Matters in Public Health: A Health Department's Guide to Performance Management.; 2018.

This toolkit builds on NACCHO's 2018 *Measuring What Matters in Public Health guide*, with a specific focus on performance measurement of health equity.[1] Performance management is the thread that weaves together multiple layers of performance assessment, planning, and improvement efforts. There is a key distinction between performance management and performance measurement (see image above from NACCHO's guide[1]).

- **Performance management** is the practice of actively using performance data to improve the public's health through the strategic use of performance standards and measures, progress reports, and ongoing quality improvement.
- **Performance measurement** is the use of quantitative metrics and indicators to collect data and track progress against strategy, goals, and objectives.
- **Performance improvement** is the positive change in public health capacity, processes, or outcomes using clear and aligned planning, monitoring, and improvement activities.

Role of Public Health Agencies

Local health departments (LHDs) play a foundational and complex role in the delivery of basic public health services in the United States.[13] These (nearly) 3,000 LHDs follow guidelines from Public Health Accreditation Board (PHAB) for their strategic planning and actions.[14] The 10 Essential Public Health Services outline public health activities to promote the health of *all people in all communities*, with equity at the center of all ten services.[15] LHD core activities include adult and childhood immunizations; epidemiology and surveillance; prevention of start and spread of outbreaks and diseases; environmental health regulation; promotion of healthy communities; and protection of community health through public health policies and community partnerships.

Methodological Foundations for the Toolkit

The development of this toolkit was based on three foundational sources which we describe below.

Environmental Scan

The content in the toolkit was based on an initial environmental scan of existing LHD health equity plans conducted in Spring 2023. The scan was conducted in February and March of 2023 of peer-reviewed literature and plans (Community Health Assessments (CHAs), Community Health Improvement Plans (CHIPs), Health Equity Plans, and Strategic Plans from local and state health departments) written by public health departments with goals or strategies to advance health equity. In brief, we found:

- Most plans used frameworks and tools by health agencies to conduct CHAs and CHIPs and adopted the CDC definition of health equity.
- Most plans noted the importance of community partnerships in addressing health equity.
- Many plans included data on health disparities within communities.
- Only a few plans incorporated HE interventions or tracked progress towards health equity goals (or reductions in health disparities) over time.

Listening Sessions With LHDs

Individuals within OT21-2103 LHD teams were invited to participate in online conversations about health equity measurement. The first conversation occurred on January 31, 2024, and was an "introductory" listening session during which findings from CPHS' environmental scan were discussed. Over 70 LHD personnel registered for the event and almost 40 attended. During the introductory listening session, the participants shared what health equity (HE) work they are doing in their LHDs. Individuals who registered for this session were sent emails that discussed the upcoming in-depth listening sessions and a registration form.

About 40 LHD personnel attended the first listening session. There were 6 LHDs whose personnel consistently participated in the conversation about how their LHDs define, measure, and track progress toward health equity as a part of their performance improvement. After the first listening session, eight personnel from seven LHDs filled out the registration form. However, only five individuals, representing three LHDs participated in the in-depth listening sessions that were held in February 2024 (see Table 1 on the right). Two participants joined the first in-depth listening session: 1) a Health Equity Planner representing a mid-size western LHD and 2) a Program Analyst representing the Chicago Department of Public Health (IL). Three participants joined the second in-depth listening session: an Epidemiologist and Program Analyst from the Chicago Department of Public Health (IL) and an Epidemiologist from the Southern Nevada Health District (NV). What we learned from the listening sessions is captured in the LHD Voices call-out boxes in this toolkit.

Table 1. In-depth Listening Sessions with LHDs, February 2024.

LHD Name	Role of attendee(s)	Listening session(s) attended
Chicago Department of Public Health (IL)	Epidemiologist 2 Program Analysts	January 31, 2024 February 20, 2024 February 22, 2024
Southern Nevada Health District (NV)	Epidemiologist	January 31, 2024 February 22, 2024
Mid-size Western LHD	Health Equity Planner	January 31, 2024 February 20, 2024

Measuring What Matters in Public Health

Much of the content included in this toolkit builds on *Measuring What Matters in Public Health*, published by NACCHO in 2018.[1] This report provides guidance on building a performance management system, supplemented with templates, worksheets, and stories from the field. The guide contains content for LHDs launching a performance management system for the first time, while also offering ideas for improvement for LHDs with well-established performance management systems. We add to this report by focusing specifically on performance measurement (an aspect of performance management) of health equity. What we learned from the listening sessions is captured in the LHD Voices call-out boxes.

Step 1: Preparation for Health Equity Performance Measures

The first step toolkit users should take is to assess your LHD to get a sense of its readiness, capability, and capacity to begin or continue designing and implementing HEPM. The following *Health Equity Performance Measurement Assessment* provides some characteristics that should be assessed to understand where your organization is. Use this assessment to inform your next steps in designing and implementing HEPM.

LHD staff should rate the six focus areas on a scale of 1-4 (1: Not yet started, 4: Embedded). The rating and scoring guide helps you to assess your LHD and provides a clear understanding of each phase.

After rating, the score should be tallied for a **total rating score**.

Scores 6-12 Minimal engagement with HEPM

Scores 13-19 Moderate degree of engagement with HEPM

Scores 20-24 HEPM is integrated within the organization

There may be experience, expertise, or data gaps that should be addressed before implementing HEPM. However, even if your organization does not currently have the experiences, resources, or expertise to successfully implement HEPM, this toolkit could be used to support opportunities for capacity-building to better position your LHD.

Health Equity Performance Measurement Assessment

Topic 1.

Your organization has clear, shared commitments to health equity, such as health equity statements, resources dedicated to health equity, and employees who are also committed to health equity in the communities they serve.

Not yet started Score=1	In progress Score=2	Launched Score=3	Embedded Score=4	Rating
My organization does not have any health equity commitments.	My organization has begun discussions about health equity but has not made clear or shared commitments to health equity.	My organization has some commitment to health equity, but is missing a key component (e.g., has health equity in the mission but no resources dedicated to health equity).	My organization has integrated their commitment to health equity (such as a health equity statement) and dedicated resources to health equity across the organization.	Select your Score. ☐ Score=1 ☐ Score=2 ☐ Score=3 ☐ Score=4

Topic 2.

Health equity is embedded across the organization's programmatic and operational practices.

Not yet started Score=1	In progress Score=2	Launched Score=3	Embedded Score=4	Rating
Health equity is not a part of the programmatic and operational practices in my organization.	My organization has begun discussions about integrating health equity in our programmatic and operational practices.	Health equity is expected to be a part of my organization's programmatic and operational practices, but may not yet be implemented across all departments.	My organization has integrated health equity principles and expectations across the entire organization's programmatic and operational practices.	Select your Score. ☐ Score=1 ☐ Score=2 ☐ Score=3 ☐ Score=4

Topic 3.

Your organization has previous experience with performance measures or engages in performance management practices.

Not yet started Score=1	In progress Score=2	Launched Score=3	Embedded Score=4	Rating
My organization has no experience with performance measures.	My organization has begun discussions about performance measures OR has begun considering which performance measures to track.	My organization has developed a set of performance measures and are actively implementing activities related to those measures.	My organization is actively tracking and assessing performance measures as a regular part of our assessment processes.	Select your Score. ☐ Score=1 ☐ Score=2 ☐ Score=3 ☐ Score=4

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Health Equity Performance Measurement Assessment

Topic 4.

Your organization has collected and analyzed local disaggregated health data across race/ethnicity groups.

Not yet started Score=1	In progress Score=2	Launched Score=3	Embedded Score=4	Rating
My organization does not collect or analyze local health data by race/ ethnicity.	My organization has begun discussions about collecting and analyzing local health data by race/ ethnicity.	My organization has begun collecting and analyzing local health data by race/ ethnicity, but may not have disaggregated data across all of the departments.	My organization regularly collects and analyzes local health data by race/ ethnicity across all programmatic areas.	Select your Score. ☐ Score=1 ☐ Score=2 ☐ Score=3 ☐ Score=4

Topic 5.

Your organization has identified racial/ethnic groups at greater health risks.

Not yet started Score=1	In progress Score=2	Launched Score=3	Embedded Score=4	Rating
My organization has not identified racial/ethnic groups that are at greater health risks in our community.	My organization has begun discussions about identifying racial/ethnic groups at greater health risks in our community.	Some departments in my organizations have identified racial/ ethnic groups at greater health risks.	All departments/ programmatic areas have identified racial/ethnic groups at greater health risks in our community.	Select your Score. ☐ Score=1 ☐ Score=2 ☐ Score=3 ☐ Score=4

Topic 6.

Your organization has established partnerships and regularly engages with community-based organizations and other stakeholders reflecting racial/ethnic groups at greater health risks.

Not yet started Score=1	In progress Score=2	Launched Score=3	Embedded Score=4	Rating
My organization has not established partnerships OR does not regularly engage with community-based organizations that reflect racial/ ethnic groups at greater health risks in our community.	My organization has begun discussions about establishing partnerships OR identifying stakeholders reflecting racial/ ethnic groups at greater health risks to regularly engage with.	Some departments in my organization regularly engage with OR has identified stakeholders reflecting racial/ ethnic groups at greater health risks in our community to regularly engage with.	All departments/ programmatic areas regularly engage with community stakeholders reflecting racial/ ethnic groups at greater health risks.	Select your Score. ☐ Score=1 ☐ Score=2 ☐ Score=3 ☐ Score=4

Total: _____

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Step 2: Assessing Health Equity Priorities and Populations

Once you have assessed where your organization is, the next step is to become familiar with the key terms that will be used throughout the toolkit (see Table 2. Glossary of Terms below). Then, depending on where your organization is (total rating from **Health Equity Performance Measurement Assessment** above), use the toolkit in the best way to support where you are. For instance, if your total score is 6-12, the best starting place is at the beginning of this toolkit with **Step 2: Assessing Health Equity Priorities and Populations**. If your total score is 13-19, the best starting place is **Step 3: Building a Model to Develop Health Equity Performance Measures**. If your total score is 20-24, your organization has established performance measures and has embedded health equity practices into the performance measures and the overall performance management process, start with **Step 5: Analytical Methods and Tracking of Performance Measurement**.

Table 2. Glossary of Terms.

Performance Measure / Health Equity-Related Terms	
Community Assets	A community asset is anything within the community "that can be used to improve the quality of community life," including people, places, community services, or employment. (Community Tool Box)
Community Health Assessment (CHA)	A CHA outlines the community-wide health status on various population health indicators which is used to inform priority issues, and then develop and implement strategies for action, including in the community health improvement plan (CHIP). (NACCHO)
Community Health Improvement Plan (CHIP)	A community-owned strategic plan to address public health problems identified from a CHA. (NACCHO)
Health Disparity	Differences in health outcomes among distinct segments of the population including differences that occur by gender, sexuality, race, ethnicity, education, income, age, disability, or living in various geographic localities. (CDC)
Health Equity	Any identifiable effort or action whose purpose was to advance a "fair and just opportunity to attain their highest level of health." (CDC)
Health Inequity	"Differences in health status or in the distribution of health resources between different population groups, arising from the social conditions in which people are born, grow, live, work and age. Health inequities are unfair and could be reduced by the right mix of government policies." (WHO)
Strategic Plan	Defines a strategy for fulfilling agency mission and vision using broad strategic priority areas based on an environmental scan of factors impacting the agency's work. (NACCHO)
Performance Management	The practice of actively using performance data to improve the public's health through the strategic use of performance standards and measures, progress reports, and ongoing quality improvement. (NACCHO)

Performance Measure / Health Equity-Related Terms	
Performance Measurement	The use of quantitative metrics and indicators to collect data and track progress against strategy, goals, and objectives. (NACCHO)
Performance Measure	The use of quantitative metrics and indicators to collect data and track progress against strategy, goals, and objectives. Qualitative measures, such as data collected via open-ended survey questions, community focus groups, and in-depth interviews, can provide context for quantitative performance measures and other data sources that inform the performance management process. (NACCHO)
Logic Model Terms	
Logic Model	A picture of how your program is intended to work. A logic model identifies your program's main components and how they should relate to one another. Logic models include process and outcome components. (CDC)
Inputs	The resources that are invested in a program or intervention, including any relevant financial, personnel, and in-kind resources. (CDC)
Activities	The events that are implemented by the program or by partners that are hypothesized to lead to positive outcomes. (CDC)
Outputs	The direct products of activities, usually some sort of tangible deliverable. (CDC)
Short-term Outcome	Changes directly connected to activities and can be observed within a short timeframe (e.g., changes in knowledge or attitude). (CDC)
Medium-term (or Intermediate) Outcome	Changes to behavior, normative, or policy that typically take longer to materialize. (CDC)
Long-term Outcome	Ultimate impacts on population-level health outcomes that can take many years to observe. (CDC)
Impacts	Refers to the longest-term (i.e., 10+ years) expected changes and assumes that all assumptions regarding programming are true and happen as expected. This may not always be included in a logic model, but often reflect the ultimate desired effects of a program. (CDC)

Note: Definitions have been drawn from linked sources (when included).

Key Concepts in Health Equity

In the past two decades, the landscape around health equity research and language has been constantly evolving. A recent literature review (2022) by the Office of Disease Prevention and Health Promotion reviewed 60 sources (e.g., peer-reviewed literature, HHS agency and public health organization websites, state health department plans) to understand how health equity and health disparities are defined and discussed.[16] They observed various definitions of health equity, health disparities, and health inequity used today which we discuss in greater detail below.

What is Health Equity?

Health equity definitions commonly contain key phrases such as "attainment," "striving for," "highest level of health," "full health potential," "optimal health," "fair and just opportunity," "absence of disparities," and "elimination of disparities in health."[16] For details on how health equity definitions vary by source, refer to pages 8-11 of *The Office of Disease Prevention and Health Promotion Report*.

In this HEPM toolkit, we define '**health equity**' according to the definition used by the CDC (see image to the right).[17] This includes efforts to identify and address "historical and contemporary injustices" and their effects on health, the inequitable distribution of social determinants that influence health outcomes, and the importance of acknowledging racism as a fundamental threat to the public's health.

Health Equity

"Any identifiable effort or action whose purpose was to advance a 'fair and just opportunity to attain their highest level of health.'"

Source: CDC

What is a Health Disparity?

Health disparities definitions contain key phrases such as "differences in health outcomes," "social/economic/environmental disadvantage," "groups of people," "avoidable," "preventable," and "inequitable."[16] For details on how health disparities definitions vary by source, refer of *The Office of Disease Prevention and Health Promotion Report*.

In this HEPM toolkit, we define '**health disparity**' according to the definition used by the CDC (see image to the right).[18] Health disparities refer to between-group differences in health outcomes; these differences are referred to as inequities when they are considered to be avoidable and unjust.[18]

Health Disparities

"Preventable differences in the burden of disease, injury, violence, or opportunities to achieve optimal health that are experienced by socially disadvantaged racial, ethnic, and other population groups, and communities"

Source: CDC

What is Health Inequity?

The concept '**inequity**' is complex and involves normative judgements regarding justice and fairness. Inequity (and equity) are concepts that express a moral commitment to social justice. The World Health organization defines health inequity as "Differences in health status or in the distribution of health resources between different population groups, arising from the social conditions in which people are born, grow, live, work and age. Health inequities are unfair and could be reduced by the right mix of government policies."[19] Below we provide brief definitions to distinguish the three commonly confused terms.

Health Equity
Opportunity for everyone to attain their full health potential

Health Disparity
Preventable differences in health outcomes between different groups

Health Inequity
Differences in health status or resources between different groups due to systematic or unjust barriers

Health Equity Frameworks

Informed by the gaps that emerged during and after the COVID-19 pandemic, the CDC launched an agency-wide strategy (in 2021) to integrate health equity into the fabric of all they do – CDC's CORE Commitment to Health Equity (shown above).[20]

To advance health equity, it is important to **go beyond simply documenting inequities** - we need to move towards eliminating the disparities. Health equity science analyzes determinants and patterns that contribute to health inequities and aims to build evidence to guide communications, programs, surveillance, policies, and future scientific study tailored to eliminate inequities.[21] For more information on health equity science, click here.

Recent health equity frameworks more explicitly highlight the roles of social determinants and structural inequities in achieving health. For example, the County Health Rankings & Roadmaps[22] uses the *Population Health Model* to organize their data measurement and ranking system, which includes measures related to health behaviors and clinical care, but also social and economic factors such as education and employment.[23–26] Healthy People 2030 (and its earlier iteration, Health People 2020) likewise uses a *Social Determinants of Health* framework[27] that highlights the importance of tracking progress made in economic development and the built environment alongside health.[28]

CONSIDERATIONS IN MEASURING HEALTH EQUITY

Measuring health equity is not straightforward – it is commonly proxied by measuring health disparities despite these being two distinct concepts.[29] Further complicating such measurements is a lack of data collection, such as deliberate data genocides. Systemic problems with data collection can also be related to a lack of funding or a lack of resources available (staff time, appropriate training). In addition, definitions of health equity are ever-evolving, and there is no consensus on this definition or how to measure the concept.

Measuring Social Determinants of Health

Often, racial and ethnic disparities in health emphasize mortality (which correlates with poor health) or specific morbidities (diseases).[30] While this is important, this may obscure larger patterns in systemic forces that are of interest to policymakers and public health workforce. For example, improvements in certain diseases over time may simply reflect changes in advancement in health technologies and not necessarily improvements in social conditions.[30] Policies that are designed to improve social determinants of health could be bolstered when we can measure how its efforts are helping to improve overall health and quality of life.[30]

Identifying Community Assets

Performance measurement has not always been created with meaningful involvement from communities most impacted by health inequities. Viewing performance measures from the lens of community assets can be beneficial to advancing health equity. According to the University of Kansas' Community Tool Box, a community asset is anything within the community "that can be used to improve the quality of community life," including elders, socioeconomic cooperation when mainstream banks reject loans for community members, or physical places like parks the community maintains.[31] Working with communities throughout all steps of performance measurement may contribute to the creation of new asset-based performance measures at the population-level that track the growth of protective factors that could help close health inequities. And according to the Advancement Project and Healthy City's Participatory Asset Mapping, LHDs' activities and interventions are more likely to succeed if rooted in where communities have strength and could be further strengthened with more resources (e.g., staff participation or funding).[32] For more details on community assets, see **Appendices B and C** and Asset-Based Community Development: A Catalyzing Worksheet.

LHD VOICES

Incorporating the community in performance measurement early on allows LHDs to identify and understand their community's perspective of their goals in terms of health equity. For example, the Southern Nevada Health District (NV) identified in their health equity performance measurement that they benefitted from being open to being taught by the communities that they serve. Additionally, they worked with gatekeepers and key stakeholders in the community to ask for their feedback on deliverables created. The Chicago Department of Public Health (IL) used the Facilitating Power's Spectrum of Community Engagement to Ownership tool to help inform their community engagement work. Please see **Appendix D** for more ways that LHDs can involve communities.

Step 3: Building a Model to Develop Health Equity Performance Measures

OVERVIEW OF PERFORMANCE MEASUREMENT USING A HEALTH EQUITY LENS

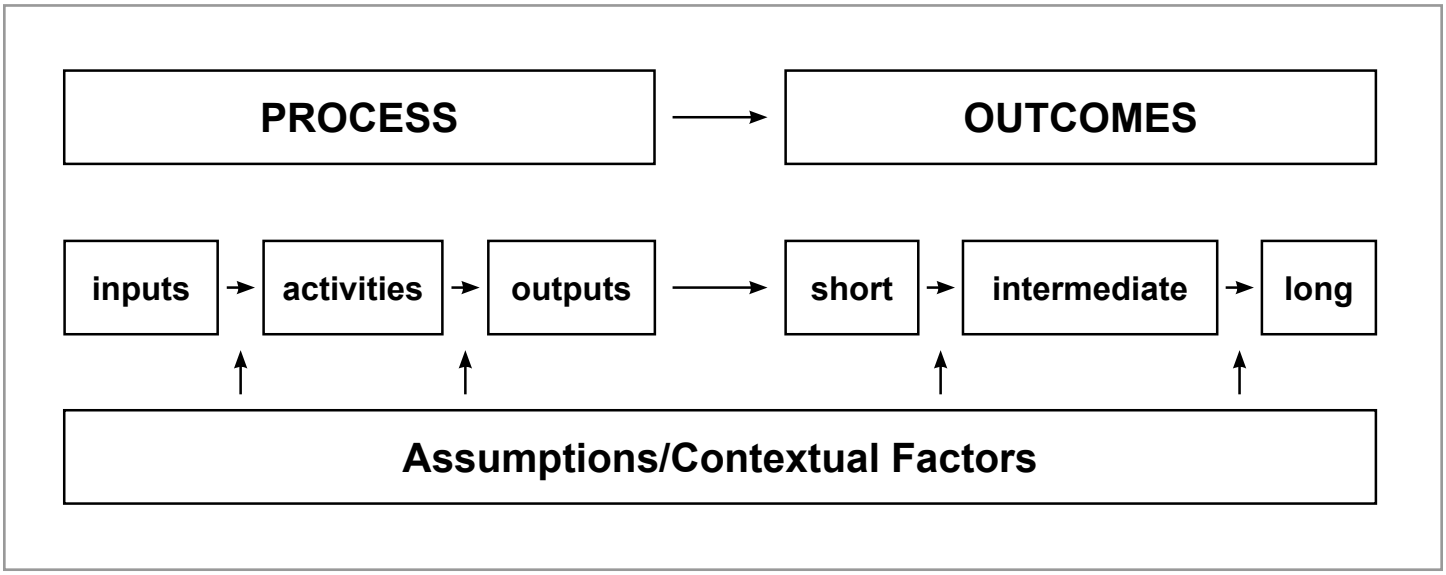
Once you have determined that your organization has both the necessary capacity to integrate health equity performance measures into your planning efforts and has a good understanding of important health equity-related concepts, the next step is to develop a model that describes your organization's programming and how it will work to affect the health and wellbeing of those affected by systemic inequities.

Goals, objectives, and measures

Performance measurement is the process of "how you measure your progress toward meeting your objectives."[33] Each objective should have a few, specific performance measures to demonstrate progress. Project *objectives* are "what your project is doing to support the overall program goal."[33] Program *goals* can be developed using tools like logic models. For more information on the distinction between goals, objectives, and activities please click here. A strong performance measure has four components: 1) what will change, 2) how much change you expect, 3) who will achieve the change, and 4) when the change will take place.[33]

Use of logic models

A logic model is one way to illustrate how LHD staff plan to carry out a program and how a successful program can contribute to outputs, short-term outcomes, medium-term outcomes, and long-term outcomes – and eventually a positive impact. How to create logic models is beyond the scope of this toolkit, but a helpful resource is the CDC's Evaluation Guide Developing and Using a Logic Model.[34] For examples of when and how to map outcomes using a logic model, use "Worksheet 3: Logic Model" of NACCHO's *Measuring What Matters in Public Health*. We have provided a brief overview of an example logic model in **Appendix E**.



Source: Logic model (page 2 of the CDC Evaluation Guide).

LHD VOICES

Logic models are important for identifying initial performance measures. LHDs who have invested in health equity work have described the importance of having clear definitions, setting attainable goals, involving community partners, and the use of logic models in the beginning steps of health equity performance measures. For example, the Chicago Department of Public Health (IL) partnered with a local academic institution to build out a logic model to help them identify initial measures.

SMART Objectives

The acronym SMART stands for **S**=Specific, **M**=Measurable, **A**=Achievable, **R**=Relevant, and **T**=Time bound. You can use "Worksheet 4: Develop Goals and SMART Objectives" in NACCHO's *Measuring What Matters in Public Health*. For more information, refer to a NACCHO webinar on Developing Goals, Objectives, and Performance Indicators for Community Health Improvement Plans (CHIPs) (slides 11-20).[35] The webinar describes logic models and related goals, objectives, outcome indicators, and performance measures in an applied context. Additionally, we have also described SMART goals in the context of health equity (see **Appendix F**).

This toolkit will cover how to create performance measures for short-term, medium-term, and long-term performance measures.

Leveraging LHD Knowledge and Experience

Many LHDs already know what diseases disproportionately burden certain races or ethnicities compared to the general population, and this knowledge can come from a general understanding or a focused process, like carrying out a Community Health Needs Assessment plan.* What can be more difficult is knowing what specific risk factors (or absence of specific protective factors) drive up population-level health inequities/disparities, and what LHDs can do to reduce these gaps.

Measuring Outcomes Tool

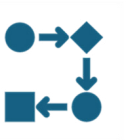
Outcomes are performance measures that LHDs set to hold themselves accountable at each level in reducing health inequities/disparities. To navigate these, we advocate for problem solving by backwards planning carried out by the entire LHD staff from leadership to those working directly with communities. As we recommend earlier in Step 3, logic models assist with identifying initial performance measures and should be created in the beginning stages. Below we outline ways to measure short-, medium-, and long-term outcomes.

Step 1:

Start by identifying diseases that may be driving up racial health disparities.

Step 2:

Think about what individual behaviors are associated with these diseases, as well as how society and institutions are associated with these diseases.



Step 3:

Decide how you are going to catalyze needed changes to individuals, institutions, society, etc. within your own constraints, like funding timelines.

Short-term outcomes

Short-term outcomes are the immediate measurable changes in knowledge, skills, and attitudes that happen as a result of the activities that LHDs and their partners implement. These initial outcomes will, in theory, eventually result in more substantive changes necessary to engender changes in health. An example of measurement of short-term outcomes include pre- and post-testing participants to see if they have increased their knowledge and skills regarding healthier behaviors.

Example: After completing a curriculum carried out by the LHD and Black elders, 35% of doctors and nurses reported practicing at least two skills that lead to more culturally responsive perinatal care four weeks after the training. This change in the percentage of doctors and nurses reporting a new set of skills represents a short-term outcome. The increase in the number of doctors and nurses able to provide better, more culturally responsive perinatal care will, in theory, lead to better patient care and, eventually, improved patient health.

Funding for this initiative is supported by the Centers for Disease Control and Prevention (CDC) under award 6 NU38OT000306-04-02 entitled National Initiative to Address COVID-19 Health Disparities Among Populations at High-Risk and Underserved, Including Racial and Ethnic Minority Populations and Rural Communities.

Measuring Outcomes Tool

Medium-term (or intermediate) outcomes

Medium-term outcomes represent the observed or expected changes to behaviors, policies, or norms that have occurred due to the implemented program and are directly tied to short-term outcomes. Medium-level outcomes can include individual, interpersonal, organizational (e.g., LHD or hospital), community (e.g., neighborhoods or cross-sector collaboration), and policy level-level measures.[37]

LHD Example: Example from St. Lous County (MO) CHIP: "[R]educe racial disparities in perinatal care access and utilization by 40% in the St. Louis region."[38] This medium-term outcome can be further broken down into two measures: 20% rise in Black birthing individuals using perinatal care or decrease of 25% in complaints from Black birthing individuals on how doctors and nurses in perinatal care treated them.

Long-term outcomes

Long-term outcomes are the expected changes that have occurred due to the set of activities implemented. These can take years to accomplish. Many health outcome goals are long-term outcomes because substantive changes in population health status may require a longer time frame. This is especially true for programming seeking to affect health equity because of the extent to which gaps in health status have perpetuated for many years.

LHD Example: Example from St. Louis County (MO) 2019 CHIP: "reduce Black infant mortality by 20% to reduce racial disparities in infant mortality between Black and white babies in St. Louis region from 60% to 48%."

Impact

Impacts refer to the longest-term (i.e., 10+ years) expected changes and assumes that all assumptions regarding programming are true and happen as expected. This may not always be included in a logic model, but often reflect the ultimate desired effects of a program.

Funding for this initiative is supported by the Centers for Disease Control and Prevention (CDC) under award 6 NU38OT000306-04-02 entitled National Initiative to Address COVID-19 Health Disparities Among Populations at High-Risk and Underserved, Including Racial and Ethnic Minority Populations and Rural Communities.

NACCHO National Association of County & City Health Officials

School of Public Health, University of Minnesota
Center for Public Health Systems

Step 4: Data for Developing Health Equity Performance Measures

As your organization determines what HEPMs to use to track your progress, you must also consider the feasibility of potential performance measures. For example, all HEPMs require data to determine how well your organization is progressing at addressing health equity, which may or may not be available, relevant to your programs, and/or too difficult to collect. To help address the feasibility of your potential HEPMs, a good understanding of what resources and data are available is critical.

HEALTH EQUITY DATA

ROLE OF QUANTITATIVE DATA

Quantitative methods leverage numeric values that can be counted, ranked, and compared using a variety of statistical analyses. Quantitative methods can include either *primary data collection* (e.g., LHD administers survey or *secondary data* analysis (e.g., data collected by other sources – see **Appendix G**). Quantitative methods and data can be used to study measures of association (i.e., two or more things are related)[39] and also maximized to draw causal inferences by addressing confounding and limitation of study designs.[40] When LHDs use survey data or other secondary data to study minority health or health disparities, it is important to remember the inherent limitations (e.g., confounding) of observational studies and avoid making generalizations of their analytical findings. A good practice is to incorporate qualitative and mixed methods to allow a better understanding of relationships.[40]

ROLE OF QUALITATIVE DATA IN CONTEXTUALIZING PERFORMANCE MEASURES

Qualitative measures are increasingly recognized as an important data collection method to support and promote health equity.[41] Qualitative measures, such as data collected via open-ended survey questions, community focus groups, and in-depth interviews, can provide context for quantitative performance measures and other data sources that inform the performance management process. For LHDs that have the capacity to conduct their own surveys and other data collection processes, including qualitative measures could enhance their understanding of quantitative performance measures by providing critical insights that could not be captured quantitatively. For example, a qualitative follow-up question could provide respondents an opportunity to share information that could contextualize their response (e.g., reasons why the respondent is not up to date in their vaccinations).

Leveraging Existing Data Sources and Reports

Data collection and analysis can be both time- and resource-intensive. LHDs already have access to valuable data that can be used to create performance measures (see Table 2 below). They may also want to compare the data from the communities they serve to national benchmarks and look for areas of similarities or differences. **Appendix G** describes resources for internal sources of data for LHDs, as well as public sources of data (and summary estimates) that LHDs can use for comparing their performance to other counties, states, and nationally. **Appendix H** provides a list of available reports and resources on health equity and measurement. Some well-known resources are included in the Table 3 below:

Table 3. Internal and External Sources of Data.

Internal Sources	Public Dashboards for Obtaining Data *(see Appendix G for details and website links)*
• Community Health Improvement Plan (CHIP) • Community Health Assessment (CHA)	• County Health Rankings & Roadmaps[42] • Healthy People 2030[43] • PLACES - Local Data for Better Health[44] • City Health Dashboard[45] • The Community Guide[46] • Behavioral Risk Factor Surveillance System (BRFSS)[42]

LHD VOICES

EXAMPLES OF THE USE OF DATA SOURCES FOR HEALTH EQUITY PERFORMANCE MEASUREMENT:

- The Chicago Department of Public Health (IL) identified health disparities using data collected through their Healthy Chicago Survey that they lead annually.
- A mid-size Western LHD used existing data like U.S. Census data and death certificates, vital statistics, and their state Health Access Survey to identify health disparities.
- The Southern Nevada Health District (NV) used the Social Vulnerability Index and feedback from community partners to identify the populations most in-need and to prioritize health outcomes.

CRITERIA FOR SELECTING PERFORMANCE MEASURES

Identifying and developing HEPM can be very challenging for LHDs. When possible, use performance measures and indicators that have already been developed for the field, as they are likely to be well-defined, grounded in evidence, and provide opportunity to benchmark with others in the field. When identifying and selecting performance measures, the timeframe of measurement (e.g., short-term versus medium- or long-term), the purpose of measurement (e.g., evaluating a health equity intervention versus measuring population health outcomes), and the quality of the performance measure are all important considerations.

When selecting or creating a performance measure, there are important questions to ask that can contribute to the use of high quality, equitable, and lasting performance measurement. Importantly, LHDs should be strategic in the performance measures that they choose to adopt; selecting too many performance measures is a common mistake that can lead to staff frustration, wasted resources, and underutilized data.

Consider the following criteria when selecting performance measures, which are drawn directly from NACCHO's Measuring What Matters in Public Health guide:

- *Relevance*: Is the measure relevant to the strategic goals and objectives?
- *Importance*: Does the measure assess an important aspect of the objective (e.g. delivery process, customer satisfaction)?
- *Clarity*: Does the measure clearly describe what is being measured to users? Is there room for misinterpretation?
- *Feasibility*: Is data collection feasible and likely to produce good data?
- *Uniqueness*: Is the measure duplicative or overlapping with other measures?
- *Manipulability*: Does the measure encourage staff to manipulate data (e.g. tracking number of complaints resolved may discourage preventing complaints in the first place)?
- *Program Influence*: Is the influence a program has over an outcome balanced with the need to track key outcomes?
- *Longevity*: Can these data be measured and compared over time?

EXAMPLES OF HEALTH EQUITY PERFORMANCE MEASURES FROM THE COUNTY HEALTH RANKINGS:

Access to the continuum of healthcare services

- Percentage of the population under age 65 without health insurance
- Ratio of population to primary care physicians/dentists/mental health providers
- Rate of hospital stays for ambulatory-care sensitive conditions per 100,000 Medicare enrollees

Access to healthy foods and food security

- Percentage of the adult population (age 18 and older) that reports a body mass index (BMI) greater than or equal to 30 kg/m^2 (age-adjusted)
- Percentage of the population who are low-income and do not live close to a grocery store
- Percentage of the population who lack adequate access to food

Step 5: Analytical Methods and Tracking of Performance Measurement

Once you have chosen HEPMs and have the necessary data to track your organization's progress at meeting its health equity-related goals, you must also adopt appropriate methods for assessing performance. How you analyze your data is dependent on a range of factors, including, for example, the time frame of your outcomes, the size of your sample, or the goals of your analysis (e.g., are you only tracking whether your organization has affected outcomes for certain populations, or whether the gap in health status has narrowed between populations. Are you trying to measure how well a specific program has affected the health of your participants, or simply whether the health of certain community members has improved irrespective of your programs? Below we provide evaluation methods for short- and long-term outcomes.

MEASURING SHORT-TERM OUTCOMES: EVALUATION METHODS

Short-term outcomes are changes directly connected to health equity activities and interventions and measure immediate effects (e.g., weeks to months). Measuring short-term outcomes often involves evaluating health equity interventions or other health equity-related programming. The CDC note, importantly, that without a focus on health equity in evaluation efforts, the effects of an intervention on addressing health disparities and inequities can go unnoticed.[47] For example, an evaluation may reveal overall improvements in health, but overlook the fact that health disparities or inequities are widening. Health equity interventions and evaluations should include careful design of short-term HEPM. Below we describe some considerations when designing short-term, or evaluation, performance measures. For more information, see the CDC's guide to Addressing Health Equity In Evaluation Efforts.

One-Group Study Designs

If a single group (e.g., Asian/Pacific Islander) is observed, then there is no comparison group. Thus, one-group designs include following a group receiving an intervention (called the treatment group) to measure if their short-term outcomes change in the desired direction. One-group study designs include:[48]

- *One-Group Post-test*: Testing short-term outcomes of the treatment group at the end with a survey. A weakness of this design is that there is no baseline comparison.
- *One-Group Pre-test/Post-test*: Following the treatment group and testing them before and after an intervention to see if there are any changes that occur pre- and post-intervention.
- *One-Group Multiple Pre-test/Post-test*: Following the treatment group and testing them before and at multiple intervals (e.g., every two weeks or every month) to see trends in short-term outcomes.

One-group designs include the measurement of a pre/post difference, where evaluators compare participants' short-term outcomes before and after the program or intervention.[48]

Two-Group Study Designs

Two-group study designs include a treatment group and a comparison group that is not receiving the intervention. As much as possible the participants in the comparison group should share the same demographics, size, location, and other characteristics as the group receiving the intervention. The advantage of a two-group study is that it is easier to see influences outside of the intervention on the comparison group's short-term outcomes. The challenges with two-group study designs are affordability, staff time (i.e., recruiting a comparison group and surveying them at multiple points), and lack of incentives for people in the comparison group to participate. Two-group study designs include:

- *Two-Group Pre-test/Post-test with no random assignment*: There are two groups, one that receives the intervention and one that is a comparison group, that are tracked over time with one pre-test and one post-test. Because there is no random assignment, it is up to the LHD staff to make sure that the group receiving the intervention and the comparison group are as similar to each other as possible.
- *Randomized Control Trial*: This has the strongest internal validity because the group receiving the intervention and the control groups are truly the same at baseline due to randomization. However, if participants start dropping out during the intervention, then the groups are no longer randomized or the same.

Two-group study designs include comparing post-treatment results in the treatment group as compared to the control group. Two-group study can also include measuring differences in the rate of change between the pre-test and post-test for the treatment and control group.

LONG-TERM MEASUREMENT: POPULATION HEALTH/SURVEILLANCE METHODS

Measuring long-term health outcomes and change over time is often referred to as population health measurement or surveillance methods. The Centers for Medicare and Medicaid defines a population health measure as "a broadly applicable indicator reflecting the quality of a group's overall health and well-being." Examples of measure topics include access to care, clinical outcomes, coordination of care and community services, health behaviors, preventive care and screening, and utilization of health services.[49] Below we describe some considerations when designing population health performance measures.

Selecting a Reference or Benchmark

Health equity performance measures typically identify a reference group. The reference group depends on the desired direction for an objective. Some objectives have a desired *increase*, like the objective to "increase the proportion of people with a usual primary care provider." In this case, the reference group is the group with the highest rate of having a usual primary care provider. Other objectives have a desired *decrease* — like the objective to "reduce the suicide rate."

Reference Groups

Reference groups compare the performance of individual population subgroups against one another, with the understanding that any gaps in performance between groups represent a disparity.[50]

- **Best-Performing Group** as a reference: This approach compares the performance of each subgroup to the group with the highest rate (assuming higher is better) as the reference group. However, this group can theoretically change over from year to year, which introduces challenges in analyzing trends over time. Additionally, if an LHD has multiple performance measures for a given goal, then the reference group can vary across measures making interpretations difficult. This approach is best used for a single measurement year.
- **Most Socially Advantaged Group** as a reference: This approach requires identifying a subgroup with highest social advantage (e.g., the group with most wealth, income, opportunities, power and least likely to face social oppression). Often, this is the white, non-Hispanic group but note that not all white people experience the same social advantage.

Reference Points

Reference points compare individual subgroups against a reference measure or benchmark that is not tied directly to the performance of any other specific subgroup.

- **Population Average** as a reference: This may be a statewide rate or national average, as well as total LHD population. A challenge is that population averages will inherently fall between the high- and low-performing subgroups and are also susceptible to outlier observations. Additionally, this approach can result in both positive and negative disparities - making interpretations difficult. We often think of disparities in terms of negative gaps (i.e., population subgroup is less than the best-performing subgroup). More importantly, it also does not firmly set expectations that the overall population performance should increase.
- **Target or Goal Setting** as a reference: This approach is flexible and requires identifying targets that are meaningful to an LHD. Decisions for "target" or "goal" can be based on reputable literature, consensus decisions, and/or historical data. In contrast to the Population Average as a reference group, this approach will raise expectations for most if not all subgroups (refer to **Appendix G** for potential public sources.)

ANTI-RACISM AND REFERENCE GROUPS

When we choose a reference group, we often make white people the dominant group to which we compare all other populations. LHDs often do not question why white people are the dominant group within their performance measurement, or even if health outcomes among the white population are a desirable goal. LHDs should consider whether within-group analyses or selecting different reference groups may provide new insights about their communities and the structural inequalities contributing to health outcomes.[51]

Gap Analysis

It is common for health inequalities between populations to be measured in two separate ways: relative and absolute differences. The Office for Health Improvement and Disparities (OHID) provides excellent guidance on measuring relative and absolute differences, which we draw on in this toolkit. According to the OHID, "When looking at indicators such as disease outcomes or life expectancy, absolute inequality shows the magnitude of difference between subgroups of the population. It is most simply calculated by subtracting the value for one group from another. Relative inequality shows the proportional difference between subgroups. It is most simply calculated by dividing the value for one group by another."

> ***Example:*** If 30% of people in Community A smoke, and 20% of people in Community B smoke then the absolute inequality between the groups is 10 percentage points and the relative inequality is 1.5, i.e. smoking prevalence is 1.5 times higher in Community A than Community B.

Because relative measures are proportions, they can be used for comparing inequality across a variety of outcomes. However, information about the overall importance or burden of the condition/indicator is lost in the relative measure. Here, OHID provides a helpful example: in relative terms, the difference of between 1 and 4 deaths per 100,000 population is the same as the difference between 100 and 400 deaths per 100,000 population. The burden of the condition/indicator is clearer in the absolute measure. In the example above, inequality in absolute terms would be 3 deaths per 100,000 population and 300 deaths per 100,000 population. However, while absolute measures can be better for reflecting the numeric burden of a health outcome, an important limitation is that absolute measures cannot be compared across different health outcomes.

OTHER CONSIDERATIONS FOR MEASUREMENT

Sub-Group Analysis: Measurement Error

Much attention has focused on the measurement errors that arise from different data collection methods when analyzing racial and ethnic health disparities.[53] As the U.S. population become more diverse, people from different countries of origin may not self-identify nor self-report with the racial and ethnic categories that are typically based on Office of Management and Budget (OMB) categories (see image to the right).

It is common to have the race/ethnicityfield (in surveys or online applications) be optional. This can lead to large number missingness. Moreover, we know that there is heterogeneity within each of the racial groups. In recent years, there has been a growing int in the collection of more granular race/ethnicitydata and in cross-cultural measurement research.[53]

- Ethnic Categories
  - Hispanic or Latino

- Racial Categories
  - American Indian or Alaska Native
  - Asian
  - Black or African American
  - Native Hawaiian or Other Pacific Islander
  - White

Source: Office of Management and Budget (OMB) Standards | Office of Research on Women's Health (nih.gov)

Sample Size

In descriptive statistics, it is a common practice to stratify the data by variables of interest (e.g., race/ethnicity, urban vs. rural, gender). Unfortunately, this stratification can sometimes lead to small sample sizes for some sub-groups. Small samples sizes can lead to unreliable estimates because the estimates can be skewed by outliers or observations that fall outside of the normal distribution that would be reflected in a larger sample. The CDC provides a tool for calculating the needed sample size for descriptive analyses through StatCalc, which is a statistical calculator that produces summary epidemiologic information.

When collecting data, an approach to address small sample sizes among sub-groups is to oversample individuals in racial-ethnic groups that may have small sample sizes. Oversampling is a common practice in the collection of large, complex surveys. For example, the Behavioral Risk Factor Surveillance System (BRFSS) oversamples Hispanic and Black person to ensure a large enough sample size for analyses. A possible analysis strategy to address small sample sizes include pooling data across months or years to increase the sample size for sub-groups. A limitation of this approach is that there may be changes over time that are lost when multiple months or years of data are pooled together.

Missing Data

One of the contributing factors of small sample sizes is missing observations within a dataset. Missing observations in a dataset can be caused by a number of factors, including:

- Attrition due to social/natural processes (Example: School graduation, dropout, death)
- Skip pattern in survey (Example: Certain questions only asked to respondents who indicate they are married)
- Random data collection issues
- Respondent refusal/Non-response[54]

Addressing missingness first involves understanding what is causing observations to be missing and understanding the distribution of the missing data. For example, it is important to consider how estimates might be biased if there is greater missingness among survey responses from some racial-ethnic groups. After assessing causes of missingness, LHDs can decide on the best method of analysis. Describing statistical techniques for addressing missing data is beyond the scope of this toolkit, but we have cited helpful resources.[54–56]

Weights

Measures can be weighted (or not) by size of the group or population when using survey data. Weighted measures account for the change over time (e.g., migration, change in social policies) in distribution of people across social or geographic groups. Weights can make mathematical adjustments for over-or under-representation of racial-ethnic groups in the sample, resulting in more reliable estimates.[57]

TRACKING HEALTH EQUITY PERFORMANCE MEASURES OVER TIME

In Step 5, LHDs should also focus on 1) developing systems to track over time, and 2) assessing through performance measures whether they are making progress toward their health equity goals. Assessing progress toward achieving health equity goal(s) requires LHDs to interpret the data that they have analyzed. LHDs commonly aim to reduce disparities or close the disparity gap by a percentage goal. For example, an LHD may have the goal to reduce the life expectancy gap by 2025 by 40% or "increase the number of people enrolled in health care insurance coverage to 90%." LHDs often use dashboards to assess how much they have closed the racial/ethnic equity gap for specific health outcomes. For example, the Chicago Department of Public Health (IL) shares life expectancy data in Chicago by race/ethnicity on their Chicago Health Atlas." Importantly, in an environmental scan of CHA/CHIPs (described in the foundational methods section), we found minimal tracking of data related to health disparities or health equity over time. We describe our findings below.

IN A REVIEW OF LHD CHA/CHIP PLANS, WE OBSERVED THE FOLLOWING TRACKING PATTERNS:

LHDs could not yet ascertain if they made progress on their performance measures.

- This happened when plans set performance measures for population health outcomes, such as reducing the mortality rate of Black infants, that might take longer than one or four years to see happen in public health surveillance.

LHDs reported on their progress in meeting performance measures but did not necessarily meet their goals.

- Douglas County, Nebraska reported on their current status in meeting health equity metrics, including decreasing the percentage of those reporting difficulty in accessing healthcare in the past year.[33] They could not achieve their 5% goal, but they reported they were able to decrease by 2% residents reporting difficulty in accessing their child's healthcare.

LHDs chose not to set performance measure goals but reported on what they achieved.

- Columbus, Ohio set non-numeric performance measures, including aiming to increase the affordability of healthy foods.[34] Their progress report included the amount of funding they gave to community gardens and to a program to increase access to produce for those facing food insecurity and chronic health problems.[34]

Step 6: Making Adjustments

Once programming has been implemented, a critical next step is periodically reviewing how things have gone and whether adjustments need to be made to better achieve your equity goals. This is where assessing the context of implementation via a process evaluation can be illustrative and instrumental for achieving your goals and objectives. In particular, qualitative methods are an excellent approach for determining where adjustments might be made to, for example, check to see what unforeseen barriers your participants are facing to reach needed services, or whether program information needs to be changed to be more culturally relevant to the community.

The first three columns of a logic model – inputs, activities, and outputs – can position you towards process-oriented questions that need to be answered to assess whether adjustments to implementation should be made. The example logic model from **Appendix E** is for a public health program that trains providers on culturally appropriate perinatal care for Black patients. Below are examples of process-oriented questions for this program:

- Did providers find the curriculum easy to understand and follow?
- Did the planned curriculum cover all necessary topics or do stakeholders (providers, Black patients, maternal and child health experts) recommend additional subject matter?
- Did LHD staff have sufficient time to plan and carry out the training, or were there things that could have optimized the planning and implementation process?
- Was the platform for the curriculum accessible to providers or were there technical issues that prevented full participation?
- Were there more optimal dissemination methods that could have improved the training uptake?

These questions can be answered by talking to stakeholders – including those that were targeted but unable to participate – to determine appropriate adjustments.

LHD VOICES

The COVID-19 pandemic exposed the longstanding structural and systematic inequities and focused the attention of on health disparities and health equity. Below are two examples of how LHDs used data to identify health disparities and develop interventions related to COVID-19.

- The Southern Nevada Health District (NV) worked with various community partners to correct misinformation related to COVID-19, prevent transmission of COVID-19, and provide pop-up vaccination clinics in underserved communities based on epidemiological data. Additionally, Southern Nevada Health District analyzed hospital discharge data to identify risk factors for COVID-19 hospitalization and mortality and to inform interventions to reduce health disparities.
- The Chicago Department of Public Health (IL) Office of Community Planning and Equity Zone team utilized data from the Chicago COVID-19 Community Vulnerability Index, which incorporated local data to identify neighborhoods in Chicago where vaccination distribution should be prioritized to reduce COVID-19 health disparities by race/ethnicity. CDPH funded community non-profit partners to form the Healthy Chicago Equity Zones, which hosted outreach and vaccination events in these prioritized areas, originally between June 2021 and June 2022.

Step 7: Disseminating Results for Accountability

A final step is to effectively disseminate ongoing progress to partners and to the public. This ensures there is an opportunity for the community to observe the benefits of public health programming, use the information provided to inform their own work, as well as offer feedback to better how public health programming is being implemented.

There are a multitude of ways to inform the public of your progress in meeting your health equity-related performance measures. Periodic (e.g., quarterly, annually) reporting that is publicly accessible is one way to get information out to community members and partners. Presenting progress directly to community partners, and/or at well-attended community meetings is another commonly employed tactic to reach the public.

THE USE OF DASHBOARDS FOR DISSEMINATION

One particularly effective – and increasingly common - dissemination tactic is the use of online dashboards that present data for a range of measures and if sampling allows, for different subpopulations. Data can be continually updated, allowing for temporal comparisons to be made, including whether progress has been made to narrow existing health disparities. These tools were particularly prevalent during the COVID-19 pandemic, which not only ensured the public had up-to-date information on COVID-19 prevalence and mortality within their communities, but also highlighted whether their communities had significant health disparities in vaccine uptake that needed addressing.

NACCHO's *Measuring What Matters in Public Health*[1] also offers example dissemination processes that different LHDs across the country have adopted to ensure the public is made aware of their progress addressing health equity in their communities. They discuss two tools, Power BI and Klipfolio, that LHDs can use to create dashboards.

Examples of health-equity focused dashboards include:

- City of Chicago Equity Dashboard
- California Department of Public Health's Office of Health Equity Dashboard
- Louisiana Department of Health's State Health Assessment Dashboard
- Philadelphia Health Equity Dashboard

CONSIDERATIONS AND CHALLENGES IN DISSEMINATION

Political Constraints on the Use of Health Equity Terminology and Activities

Some LHDs may be restricted in the health equity-related activities they can undertake and performance measurement due to the political climate in their state.[58] The O'Neill Institute at Georgetown Law has documented how several states have ligations against diversity efforts. In listening sessions with LHD staff, several shared that state legislatures are combative with anything associated with health equity, which includes adopting the use of the term "health equity."

Funding Performance Measurement

Funding for health equity performance measurement is an ongoing challenge that many LHDs face. In listening sessions, LHDs identified that health equity work is often funded by short-term grants, making it hard to devote consistent resource to performance measurement related to health equity. Further, grant funding is not consistently available to support the data infrastructure needed for ongoing and innovative health equity measurement and dissemination. Grant-funding will often fund the development of the initial measurement infrastructure, but funding sources for maintenance are much more limited.

Conclusion

Performance measures are indicators that are used to create performance standards, which can be used to track and assess performance as a part of performance management or quality improvement processes. In 2022, equity was designated as a Fundamental Public Health Service (FPHS), underscoring its significance as a priority for LHDs and emphasizing its crucial role in safeguarding community health and enhancing overall well-being.[59] The goal of this toolkit is to expand the capacity of LHDs to use performance metrics to guide their health equity activities and interventions, and to take on pressing health equity challenges in the communities they serve.

Appendix

Appendix A. Organizations Focusing on Health Equity and Health Disparities

Appendix B. Mapping Community Assets

Appendix C. Asset-Based Identification Sample Questions

Appendix D. Designing Performance Measures: Nothing About Us Without Us[60]

Appendix E. Performance Measures in A Logic Model

Appendix F. SMART Objectives for Performance Measures for Reducing Health Disparities

Appendix G. Internal and External Data Resources

Appendix H. List of Available Reports and Resources on Health Equity and Measurement

Appendix A: Organizations Focusing on Health Equity and Health Disparities

Below we highlight leading organizations (in alphabetical order) that focus on advancing health equity and provide resources (e.g., fact sheets, recorded webinars) for the larger public to understand the drivers of health disparities. Although these resources may not be focused on LHD, many of the concepts, findings, and recommendations may be directly relevant.

Organization Name	Topic	Link to Webpage
American Medical Association (AMA)	AMA Center for Health Equity	https://www.ama-assn.org/topics/ama-center-health-equity
American Public Health Association (APHA)	Health Equity	https://www.apha.org/topics-and-issues/health-equity
Centers for Disease Control and Prevention (CDC)	CDC's CORE Commitment to Health Equity	https://www.cdc.gov/healthequity/index.html
	Conversations in Equity	https://blogs.cdc.gov/healthequity/
	Office of Health Equity (OHE)	https://www.cdc.gov/minorityhealth/index.html
Centers for Medicare & Medicaid Services (CMS)	Health Equity Programs and Healthcare Resources	https://www.cms.gov/priorities/health-equity/minority-health/equity-programs
	CMS Framework for Health Equity	https://www.cms.gov/priorities/health-equity/minority-health/equity-programs/framework
The Commonwealth Fund	Health Equity	https://www.commonwealthfund.org/health-equity
Health Affairs	Health Equity	https://www.healthaffairs.org/topic/1244
U.S. Department of Health and Human Services (HHS)	Office of Minority Health (OMH)	https://minorityhealth.hhs.gov/
Office of Disease Prevention and Health Promotion (OASH)	Healthy People 2030	https://health.gov/healthypeople/priority-areas
Institute for Healthcare Improvement (IHI)	Health Equity	https://www.ihi.org/improvement-areas/health-equity
The Joint Commission	Health Care Equity	https://www.jointcommission.org/our-priorities/health-care-equity/
Kaiser Family Foundation (KFF.org)	Racial Equity and Health Policy	https://www.kff.org/racial-equity-and-health-policy/

Organization Name	Topic	Link to Webpage
NACCHO	Health Equity and Social Justice Program	https://www.naccho.org/programs/public-health-infrastructure/health-equity
National Committee for Quality Assurance (NCQA)	Health Equity	https://www.ncqa.org/health-equity/
National Quality Forum (NQF)	NQF Health Equity Program	https://www.qualityforum.org/NQFs_Roadmap_to_Health_Equity.aspx
U.S. Department of Health & Human Services' National Institutes of Health (NIH)	National Institute on Minority Health and Health Disparities (NIMHD)	National Institute on Minority Health and Health Disparities (nih.gov)
	Understanding Health Disparities Series	https://www.nimhd.nih.gov/resources/understanding-health-disparities/
	Director's Seminar Series	https://nimhd.nih.gov/news-events/conferences-events/directors-seminar-series/
RAND	Health Equity	https://www.rand.org/topics/health-equity.html
RTI	RTI Health Equity	https://www.rti.org/focus-area/health-equity
Robert Wood Johnson Foundation (RWJF)	What is Health Equity?	https://www.rwjf.org/en/insights/our-research/2017/05/what-is-health-equity-.html
	Achieving Health Equity	https://www.rwjf.org/en/building-a-culture-of-health/focus-areas/Features/achieving-health-equity.html
State Health & Value Strategies (SHVS)	Health Equity Resources	https://www.shvs.org/health-equity-resources/
U.S. Food & Drug Administration (FDA)	Minority and Health Equity	https://www.fda.gov/consumers/minority-health-and-health-equity
	Health Equity Forum Podcast	https://www.fda.gov/consumers/minority-health-and-health-equity/health-equity-forum-podcast
World Health Organization (WHO)	Health Equity	https://www.who.int/health-topics/health-equity#tab=tab_1
The White House	Advancing Equity and Racial Justice Through the Federal Government	https://www.whitehouse.gov/equity/

Appendix B. Mapping Community Assets

Mapping community assets can be broken down into three sections:

1. Timing of when to map community assets
2. Process to identify community assets
3. Putting those community assets on a map or visual aid

Timing of Mapping Community Assets

To build rapport over time with communities, LHD staff should identify and map community assets every day with communities they work with.[31] This is especially important if an LHD staff does not come from the same background as communities because intentionally uncovering assets will deepen their understanding of the communities they serve. However, there are instances when this exercise might be especially useful, such as:

- *When carrying out Community Health Needs Assessments, Community Health Improvement Plans, or other assessments or plans*: Asset-based mapping "find assets to mobilize to address community needs" in creating effective strategies to close health inequities.[31]
- *"When the community includes talented and experienced [people] whose skills are valuable but underutilized;"*[31] Asset mapping can increase LHD staffs' general awareness on how community members are talented and wise, and it creates opportunities for community members and LHD staff to brainstorm new strategies that could tap into underutilized talents.

Identifying Community Assets Before Mapping

Identifying and mapping community assets require participation from members of impacted communities, who by virtue of growing up and living in their communities might see assets that would otherwise be obscured to external observers like LHD staff. LHD staff can set up a series of community meetings, interviews, community walks (i.e., hosting conversations while walking around a neighborhood), or surveys where community members can give feedback on assets as it pertains to closing a gap on a long-term population outcome.[32]

For LHDs interested in practicing asset-based identification, we have created questions in **Appendix C** that you can use to talk with communities in each of these categories. These questions were created Asset-Based Community Development: A Catalyzing Worksheet which contains a list of groups of assets to inventory and assess.

- *Individual assets*: "People's strengths, skills, knowledge, passions, interests, and creativity. [...] Gifts of the head (knowledge), heart (passion), and hands (skills)."[61]
- *Social assets*: "Meaningful and resource relationships, networks, families, and groups."[61]
- *Cultural assets*: "What are the various past and existing cultural traditions, customs, ideas, behaviors, and practices—the ways of doing, being, and seeing the world?"[61]
- *Ecosystems*: This includes asking about the environmental and ecological world of a community.[61] For interventions with Native communities, their relationship with the land and nature is integral to who they are and their health, and it is helpful to include this perspective in creating activities or interventions that align with their values, beliefs, and strengths.[62]
- *Built environment*: Human-made structures, which include houses, buildings, common spaces (e.g., places to hold markets, gatherings, and celebrations), and common amenities (e.g., bathrooms and commercial kitchens).[61]
- *Political and institutional*: "The existing stock of goodwill, influence, and power that people, organizations, and institutions [...] can leverage or exercise" in addressing a health issue.[61] "Public sector (government), private sector (business), and civic sector (social, cultural, and philanthropic organizations), issued-based and place based nonprofits, and faith communities."[61]

After asking questions on each of these potential assets, the LHD should be able to collect a list of assets, such as individuals' names or places, in preparation for the next step of mapping.

Mapping Community Assets

There are a variety of ways to map community assets:

- Using a large street map of the community, start putting post-it notes, push pins, and dot stickers to mark the location of individuals, spaces, and organizations. Using different colors for different categories (e.g., individual versus social) might also be helpful to see where various assets congregate.[31]
- LHDs can talk with community members, use software such as maptive to map out assets community members identified, and then show community members for their feedback. While there is a learning curve to using mapping software, the software can provide more sophisticated visualization including overlays or "visually placing one category of map over another, [and giving users the ability to change] these visual patterns with the push of a button."[31]
- Making "non-literal maps."[31] In these instances, understanding the quantity of assets in communities or how different assets are related to each other is more important than their geographic location.
    - Another technique is using "pictures, a photographic record, [and] even small models of building and public spaces" that are placed to show how they connect with each other and amplify protective factors against a health condition or issue.[31] For instance, maybe someone working in the barber shop has built trust with communities and knows which medical providers would provide culturally responsive care to their community members.

Appendix C: Asset-Based Identification Sample Questions Tool

Individual	▸ Thinking about what we can do to reduce <*insert a health inequity like higher cancer death rates*>, who do people in the community look up to or listen to? What positive character traits and qualities make this person someone who others inherently trust? ▸ What have people been doing in the neighborhood that you think can help bring down this <*insert health inequity*>? It can be something formal like a program or informal like someone always being ready to help. ▸ If money and time were not issues, what type of creative solutions could you come up with to reduce this <*insert health inequity*>?
Social	▸ When someone experiences <*insert a health inequity*>, who do they go to for help in the community? ▸ Social safety nets are relationships, networks, families, or groups that people go to when they are in trouble, need moral support, or need introduction to a resource or someone who can help them. Can you name some social safety nets that we could connect with and see if they can help us reduce <*insert health inequity*>? ▸ What keeps these social safety nets intact and healthy in your community? These can be individuals or shared practices. ▸ Who do people go to when they are in financial trouble? Who will invest in a small business or venture when banks will not provide loans for the community?
Cultural	▸ What traditions, cultural activities, and shared practices keep your community and you healthy, and why? [*E.g., ricing for Anishinaabe folks protects their mental health as they harvest wild rice as a group and protects their physical health by being a nutritious, low glycemic food*[63]] ▸ Thinking about this health issue, what, if any, cultural activities, traditions, and shared practices protect people in your community from developing this health issue? What can we do to help make this more available for everyone in your community? ▸ Have there been past cultural activities or traditions that have either been purposely erased (e.g., by boarding schools for Native communities) or forgotten that should be revisited and revived? Are there any activities, languages, and traditions that could help address this health issue?
Ecosystems	▸ Ecosystems – meaning lands, waters, wildlife, and vegetation – give a lot of benefits to communities whether it is through food or helping preserve our cultural lifeways.64 What, if any, benefits from ecosystems should we keep in mind as we are working to reduce this health issue? ▸ What types of green spaces exist in your neighborhood? How do people use these green spaces currently? If these green spaces were expanded, how might that affect your health or this health issue we are concerned about? ▸ How often do you use these ecosystems or green spaces? Are there any barriers (e.g., air pollution) that are preventing you from fully benefiting from them?

Funding for this initiative is supported by the Centers for Disease Control and Prevention (CDC) under award 6 NU38OT000306-04-02 entitled National Initiative to Address COVID-19 Health Disparities Among Populations at High-Risk and Underserved, Including Racial and Ethnic Minority Populations and Rural Communities.

Built Environment	➢ Name important structures and spaces to the community, and why those are important. ➢ What structures, like a park where people have community gardens and exercise together, would be helpful to reduce this health issue? What funding or resources are needed to maintain these structures or make it easier for people to benefit from them? ➢ Where do people naturally drift to? What spaces build a sense of community, and why?
Political and Institutional	➢ How do influential organizations, institutions, and players in local politics connect to the health of a community (particularly on this health issue)? ➢ Who or what entity has great influence and could support efforts to address this health issue? Why would they be powerful here?

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Appendix D. Designing Performance Measures: Nothing About Us Without Us

Communities and LHDs can work together to prioritize which health outcomes to focus on depending on communities' needs, feasibility, and funding opportunities in a Community Health Improvement Plan. It is important to seek enough funding and factor enough time to involve the communities most impacted by inequities in as many steps as possible as listed below.

1. Communities should work with LHDs to identify health issues their communities face. This could include being involved in the drafting of a Community Health Needs Assessment.
2. As LHDs prioritize which health inequities to focus on, there are multiple opportunities to meaningfully involve communities including:
    a. These Communities can help LHDs create performance measures that reflect population health outcomes found in national standards but can be feasibly improved on and measured locally. One way to carry this out is through this three-step approach:
        i. First, LHDs can present data and research to community members on what type of inequities they might want to consider for long-term outcomes, and what type of short-term and medium-term outcomes are feasible to achieve these long-term outcomes based on what LHDs and other partners can carry out.
        ii. Second, using a World Café model or an advisory committee of community members, communities let LHDs know 1) whether this data or research reflects their lived experiences or what information might be missing and 2) what strategies might resonate and are feasible to carry out in their communities by LHDs with their support:
        iii. Third, LHDs modify outcomes and outputs based on their feedback and later circle back to show community members how their advice impacted the final outputs, short-term outcomes, medium-term outcomes, and even long-term outcomes.

The benefits of this approach include:

- Bringing in valuable perspectives from people who live with inequities every day that might not be captured by research.
- Creating measures that are more culturally responsive to the communities most impacted by inequities.
- Creating opportunities to talk about strategies that can build on community assets and prevent the final product from being deficit focused.

Appendix E. Performance Measures in a Logic Model Tool

Logic models are important for identifying initial performance measures. This tool provides a logic model template that LHDs can use to illustrate how LHD staff plan to carry out a program and how a successful program can contribute to outputs, short-term outcomes, medium-term outcomes, and long-term outcomes – and eventually a positive impact.[36] The first column is the component of a logic model and an explanation of what each component is. The second column is an example of each component using reducing disparities in perinatal care as the topic of focus. The last column is space for your LHD to fill out based on your specific health equity goal.

Component	*Reducing Disparities in Perinatal Care Example*	*Your LHD*
Inputs What an LHD needs to carry out activities	LHD staff time for planning and carrying out the curriculum Flyers designed to be posted at hospital bulletin boards	
Activities What an LHD needs to carry out activities	Curriculum for doctors and nurses to increase culturally responsive perinatal care for Black patients	
Outputs What an LHD needs to carry out activities	55% of doctors and nurses in the County receive certificates of completion for cultural awareness and sensitivity training	
Short-term Outcomes What an LHD needs to carry out activities	25% of doctors and nurses reported practicing at least two skills that leads to more culturally responsive perinatal care	
Medium-term Outcomes When individuals, organizations, etc. successfully adopted new changes	Reduce racial disparities in perinatal care access and utilization by 50%	
Long-term Outcomes Ultimate impacts on population-level health outcomes that can take a decade or more	Reduce Black infant mortality by 30% to reduce racial disparities in infant mortality between Black and white babies from 70% to 49%	

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Appendix F. SMART Objectives for Performance Measures for Reducing Health Disparities Tool

The process for creating these measurable outcomes is: 1) identifying what to change, 2) understanding basic details like the intended direction of change and units, and 3) adding details to finalize a SMART metric by which LHD can hold itself accountable. This worksheet will help local health departments develop SMART objectives (to achieve a goal). First, write a general goal that you have for your LHD. Remember that goals provide a general direction or purpose. A goal is a broad, overarching statement of what an organization, program, or individual aims to achieve. It defines the desired end result or outcome. Then, use the SMART approach to develop your general LHD goal to a SMART objective.

Your LHD Goal

	Description	*Points to Consider*	*Your LHD*
S **Specific**	Define the goal with clarity. What does your LHD want to impact? For which population(s)? Who is involved? Where will it be done?	*Consider…* What are the primary health outcomes your LHD aims to impact (e.g., reducing obesity rates, improving vaccination coverage, decreasing incidence of chronic diseases)?	
M **Measurable**	Specify "how much" change is expected and how to measure or quantify this change.	*Consider…* What are the current baseline metrics for the targeted health outcomes? What specific changes or improvements do we aim to achieve, and how will these be quantified? What systems and processes will we use to collect and track data related to the health outcomes?	

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	Description	*Points to Consider*	*Your LHD*
A **Achievable**	LHDs should be able to meet these performance measures "within a given time frame," "with available program resources," and with current or future partnerships they can conceivably build with communities and other external stakeholders to carry out this work successfully.	*Consider…* What resources (e.g., funding, personnel, equipment) are available to support the initiative? Which organizations or entities can we partner with to support the initiative (e.g., local businesses, non-profits, academic institutions)? What strategies will we use to raise awareness and encourage participation?	
R **Realistic**	These performance measures are feasible while being "useful" and relatable to the LHD's overarching goal to reduce the health inequities/ disparities articulated in the long-term outcomes.	*Consider…* Given our current resources and past experiences, how realistic are the targeted health outcome improvements? What potential barriers or challenges might we face, and how can we address them? How will the initiative specifically address and reduce health disparities within the target population?	
T **Time-bound**	Specify by when a performance measure should be made that factors in "planning and evaluating the program."	*Consider…* What are the key milestones and deadlines for the initiative from start to completion? What criteria will we use to evaluate the initiative's success at the end of the implementation period?	
SMART Objective	Combine all aspects above to create a detailed objective related to your goal.	Objective:	

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Appendix G. Internal and External Data Resources

Internal Data Sources
Community Health Assessment (CHA) and Community Health Improvement Plan (CHIP). A CHA outlines the community-wide health status on various population health indicators which is used to inform priority issues, and then develop and implement strategies for action, including in the CHIP. (NACCHO)
Public Data Sources
Behavioral Risk Factor Surveillance System. Administered by the CDC, the Behavioral Risk Factor Surveillance System (BRFSS) is the nation's premier system of health-related telephone surveys that collect state data about U.S. residents regarding their health-related risk behaviors, chronic health conditions, and use of preventive services. BRFSS collects data in all 50 states as well as the District of Columbia and three U.S. territories. BRFSS completes more than 400,000 adult interviews each year.[42] URL: https://www.cdc.gov/brfss/index.html LHDs can use BRFSS to find city and county data collected through the Selected Metropolitan/Micropolitan Area Risk Trends (SMART) project, the Web Enabled Analysis Tool (WEAT), interactive maps, and other resources provided through BRFSS.
County Health Rankings & Roadmaps (CHR&R). These data can be explored by location (i.e., county, state, or zipcode) and topic and include data for comparison (the state in which the county resides and the United States).[22] County-specific data can also be compared to other counties of interest. URL: https://www.countyhealthrankings.org/health-data Measures are grouped into five categories: Health Outcomes (5 measures), Health Behaviors (9 measures), Clinical Care (7 measures), Social & Economic Factors (8 measures), Physical Environment (5 measures). Additionally, the 2023 County Health Rankings National Findings Report is published and available.[65]
Healthy People 2030. Healthy People provides 10-year, measurable public health objectives and tools to help track progress toward achieving them. This resource includes disparities data for population-based core objectives with available demographic group data for a given time point. There is also a description of key concepts in assessments of disparities.[66] URL: https://health.gov/healthypeople *Health Equity in Healthy People 2030*. Healthy People 2030's has a focus on health literacy and social determinants of health, which are closely tied to the emphasis on health equity. In line with this focus, Healthy People 2030 provides tools for action to help individuals, organizations, and communities committed to improving health and well-being advance health equity. *Healthy People 2020 Overview of Health Disparities*.[67] This interactive dashboard provides changes in disparities by population characteristics (i.e., sex, race/ethnicity, educational attainment, family income, disability status, and geographic location) for specific topic areas such as access to health services, adolescent health, diabetes, immunization, infectious diseases, injury and violence prevention, respiratory diseases, tobacco use, etc.

Public Data Sources

PLACES: Local Data for Better Health | CDC. PLACES provides health data for small areas across the country. This allows local health departments and jurisdictions, regardless of population size and rurality, to better understand the burden and geographic distribution of health measures in their area and assist them in planning public health interventions.

URL: https://www.cdc.gov/places/index.html

Measures are grouped into six categories:[68] Health Outcomes (13 measures), Prevention (9 measures), Health Risk Behaviors (4 measures), Disabilities (7 measures), Health Status (3 measures), and Social Determinants of Health (9 measures).

City Health Dashboard: Empowering cities to create thriving communities. This dashboard (created by Department of Population Health at NYU Grossman School of Medicine) aims to provide communities and city leaders with an array of regularly updated data specific to neighborhood and/or city boundaries – such as life expectancy, park access, and children in poverty – to improve the health and well-being of everyone in the community.

URL: https://www.cityhealthdashboard.com/

Balanced across the five domains

- *Clinical Care* (5 measures) → dental care; prenatal care; preventive services (65+); routine checkup (18+); uninsured
- *Health Behavior* (4 measures) → binge drinking; physical inactivity; smoking; teen births
- *Health Outcomes* (14 measures) → premature deaths (all-cause); breast cancer deaths; cardiovascular disease deaths; colorectal cancer deaths; opioid overdose deaths; diabetes; firearm homicides; firearm suicides; frequent mental distress; frequent distress; high blood pressure; life expectancy; low birthweight; obesity
- *Physical Environment* (6 measures) → air pollution - ozone; air pollution - particulate matter; housing with potential lead risk; lead exposure risk index; park access; walkability
- *Social and Economic Factors* (11 measures) → broadband connection; children in poverty; chronic absenteeism; credit insecurity index; high school completion; income inequality; neighborhood racial/ethnic segregation; racial/ethnic diversity; rent burden; third-grade reading scores; unemployment

The Guide to Community Preventive Services (The Community Guide). A collection of evidence-based recommendations and findings from the Community Preventive Services Task Force (CPSTF). Fact sheets (which summarize intervention approaches) are available for various topics.

URL: https://www.thecommunityguide.org/

[note: The categories below are our own.]

- Clinical Care → increasing appropriate vaccination; oral health; pregnancy health
- Health Behavior → increasing physical activity; cancer screening; obesity prevention and control; diabetes prevention and control; motor vehicle-related injury prevention; health disease and stroke prevention; nutrition; preventing excessive alcohol consumption; skin cancer prevention; violence prevention
- Health Outcomes → asthma; HIV, STIs, and teen pregnancy; mental health; tobacco use; worksite health

Appendix H. List of Available Reports and Resources on Health Equity and Health Disparities

Commissioned Paper: Healthcare Disparities Measurement

By National Quality Forum, *August 2011*

This report describes how to evaluate disparity-sensitive quality measures, understand methodological issues with disparities measurement, and how to identify measurement gaps in disparities.

A Roadmap for Promoting Health Equity and Eliminating Disparities: The Four I's for Health Equity

By National Quality Forum, *September 2017*

This report focuses on selected conditions as case studies. The roadmap to health equity lays out four actions: 1) prioritizing measures that can help to identify and monitor disparities, 2) implementing evidence-based interventions to reduce disparities, 3) investing in the development and use of measures to assess interventions that reduce disparities, and 4) providing incentives to reduce disparities.

The Future of Nursing 2020-2030: Charting a Path to Achieve Health Equity

The National Academy of Science, *2021*

This report explores how nurses can work to reduce health disparities and promote equity, while keeping costs at bay, utilizing technology, and maintaining patient and family-focused care. Nurses live and work at the intersection of health, education, and communities. Nurses have a critical role to play in achieving the goal of health equity, but they need robust education, supportive work environments, and autonomy. By leveraging these attributes, nursing will help to create and contribute comprehensively to equitable public health and health care systems that are designed to work for everyone.

Resources for States to Address Health Equity and Disparities - NASHP

National Academy for State Health Policy (NASHP), *March 2021*

This toolkit showcases effective state efforts to achieve health equity, improve care, and prioritize the social determinants of health. Resources are categorized by: 1) racial and ethnic disparities, 2) state models, and 3) social determinants of health.

Developing Health Equity Measures

Office of the Assistant Secretary for Planning and Evaluation & Office of Health Policy, *May 2021*

This report directly responds to Executive Order 13985, Advancing Racial Equity and Support for Underserved Communities Through the Federal Government, which asks all federal agencies to "identify the best methods, consistent with applicable law, to assist agencies in assessing equity with respect to race, ethnicity, religion, income, geography, gender identity, sexual orientation, and disability." In this report, ten existing approaches to health equity measurement were identified and reviewed by a technical expert panel. Although this report focuses on the Medicare program, much of the findings are applicable more broadly, including the definition of a health equity measurement approach, the criteria that were developed for evaluating health equity measures, and discussion of the measures identified.

Advancing Health Equity: A Guide to Language, Narrative and Concepts

Association of American Medical Colleges (AAMC) Center for Health Justice, *October 2021*

The field of health equity, as a scholarly domain and as a central issue in medicine, has evolved a great deal in recent years. A lot has been learned, and important progress has been made; yet there is still much that is being debated. In that spirit, teams from the AAMC and Center for Health Justice came together to produce this document, providing physicians, health care workers and others a valuable foundational toolkit for health equity.

Health Equity and Health Disparities Environmental Scan

By Office of Disease Prevention and Health Promotion (ODPHP), *March 2022*

This environmental scan summarizes how health equity and health disparities are defined and communicated within the field of public health. It helps inform the development and dissemination of health equity and health disparities content and new products for Healthy People 2030.

Comparing Major Health Equity Frameworks & Measures

RTI Health Advance, *January 2023*

There are two types of quality measures: regulatory-driven measures (required or incentivized by the federal government) and measures recommended from healthcare organizations and programs (including federal departments and other non-profits, think tanks and research entities). This article provides an overview of the major health equity frameworks and measures that are forming how health equity performance will be implemented and quantified.

Disparities in Health and Health Care: 5 Key Questions and Answers | KFF

KFF, *April 2023*

This brief provides an introduction to what health and health care disparities are, why it is important to address disparities, what the status of disparities is today, recent federal actions to address disparities, and key issues related to addressing disparities looking ahead. The COVID-19 pandemic and nationwide racial justice movement over the past several years have heightened the focus on health disparities and their underlying causes and contributed to the increased prioritization of health equity.

Health Equity Measurement: Considerations for Selecting a Benchmark

State Health & Value Strategies (SHVS), *September 2023*

There is no single ideal benchmark for health equity measurement. This brief describes four common approaches to health equity benchmarking and outlines the advantages and disadvantages that states should weigh when selecting a benchmark approach. The examples focus on benchmarking by race/ethnicity.

MINNESOTA HEALTH CARE DISPARITIES by Race, Ethnicity, Preferred Language, and Country of Origin

By MN Community Measurement (MNCM), *October 2023*

This report includes:

- Summary of performance rates by each RELC category for each measure.
- Three-year trend analysis by RELC category from 2020 to 2022.
- Snapshot summary of performance rates for each measure by Black, Indigenous, and People of Color (BIPOC) populations.

NCI - Health Disparities Calculator (HD*Calc)

National Cancer Institute

The Health Disparities Calculator (HD*Calc) was originally developed to expand the range of measures for evaluating health disparities related to cancer. However, since it can be used with any dataset, HD*Calc can be used in any research arena.

Cross-sectional and trend data categorized by disparity groups (e.g., area-socioeconomic status, race/ethnicity, geographic areas) can be imported into HD*Calc to generate four absolute, seven relative summary measures of disparity, and two pair comparison measures.

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