Complete Parks Indicators

A Systems Approach to Assessing Parks
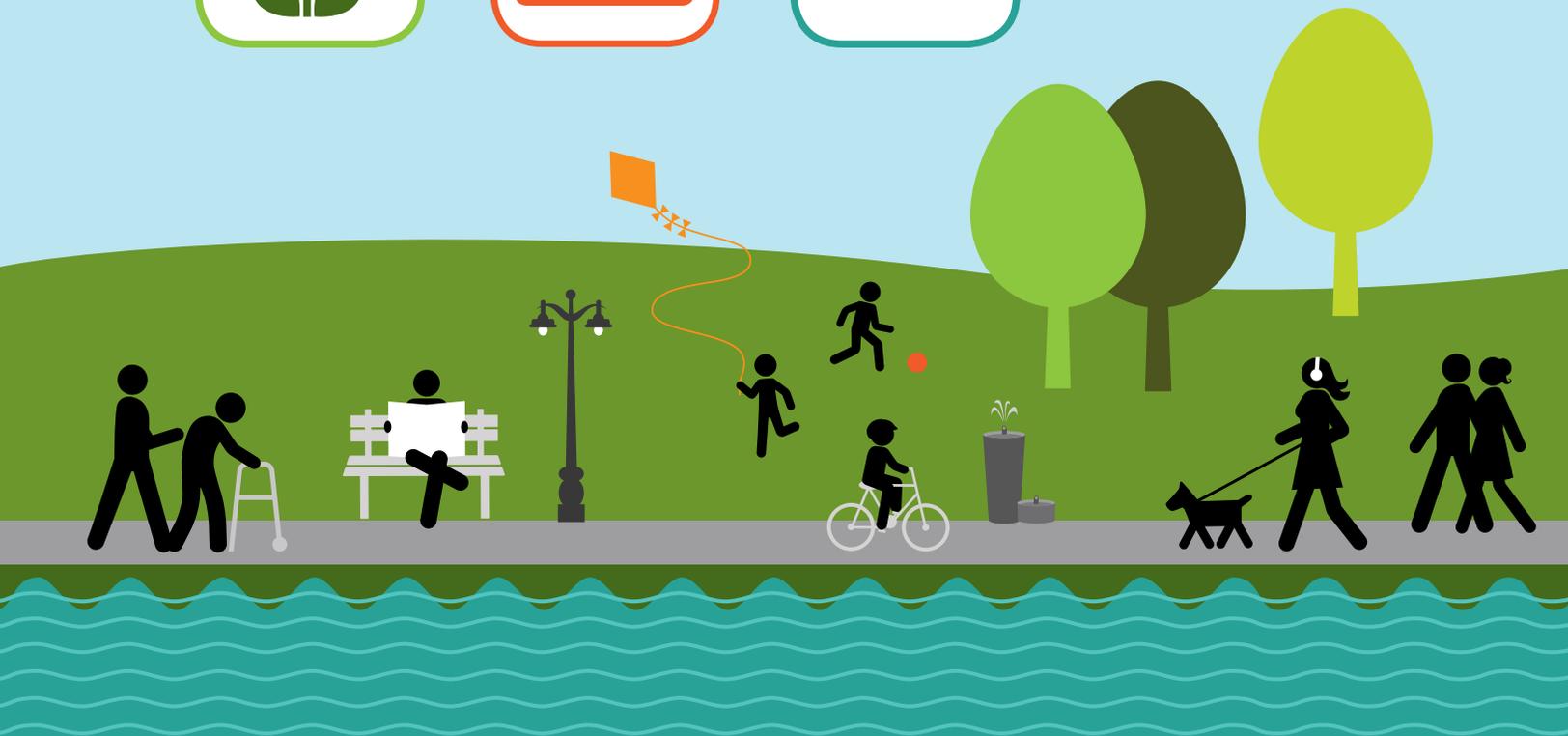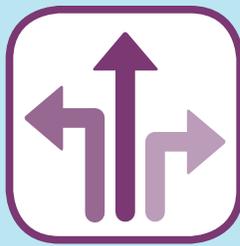
ChangeLab Solutions

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Introduction

Most people with a neighborhood park can name what they do or do not like about it, but they might not be able to say much about other parks in the city, county, or area where they live. Within any jurisdiction, parks can vary greatly. Affluent neighborhoods typically have higher-quality parks that are well maintained and better funded, compared to low-income areas that often have greater needs and fewer resources.[1] Complete Parks is a way of thinking about a parks system as a comprehensive whole – its strengths, issues, and inequities – and takes into account communities' needs in relation to parks or the lack of parks, the context of various neighborhoods, and other interconnected systems and institutions.

Assessing a parks system is one of the first steps in creating a Complete Parks system. By using the best available data on local priorities, assets, and context, a city, county, or town can make decisions based on a deeper understanding of what is actually happening in communities, rather than relying on assumptions or guesswork. Assessing a parks system helps identify priorities, inform a strategic planning process, and reveal patterns of inequities that should be addressed and remedied.

Complete Parks Indicators presents indicators and sample metrics for assessing a parks system. Specifically, it examines the 7 Complete Parks elements: Engage, Connect, Locate, Activate, Grow, Protect, and Fund. When addressed together, these 7 elements result in a Complete Parks system that

- Provides all residents with easy access to a great park that fulfills each community's needs for nature, open space, and recreational activities, recognizing that there is no one-size-fits-all solution;
- Closes the gaps in parks access and quality by improving parks in neglected places and increasing park area for groups with the least access and the greatest need; and
- Supports health and health equity by incorporating holistic health into how parks are distributed, operated, and used by people and communities. Complete Parks helps creates the conditions for all people to attain their full health potential by considering how the Complete Parks elements can improve or undermine health.

Developed for local government staff, this document introduces the 7 Complete Parks elements, presents indicators and sample metrics for each element, and provides guidance for multi-disciplinary groups on how to collect the data.

Getting Started

Successful implementation of a Complete Parks system relies on many government agencies and community-based groups working well together in many areas, including collecting, sharing, and analyzing data. Decisions about assessing parks, from selecting indicators to adapting metrics, should be made by a local group made up of residents who represent the various communities in a city, county, or area, as well as people from many local government agencies and departments. Including communities and a range of local agencies and departments in this decision-making and parks assessment process makes sense because it

- Can make achieving communities' vision for Complete Parks more likely. When conversations with community members inform decisions, civic projects can be more responsive to that community's needs, priorities, and preferences, and are more likely to be effective and succeed.[2]

- Increases capacity to conduct a meaningful assessment. Working with data can require a range of skills, resources, and supports. Spreading this responsibility across many groups and sectors makes it more likely that the assessment will include the most pertinent metrics, rather than fallback metrics that the group is able to collect easily but that may be less relevant.

- Takes full advantage of existing data across systems and minimizes redundant work. The Complete Parks elements span the purview of many agencies, departments, and community-based or non-profit organizations. By bringing together various representatives, the group can access the data that each member collects or knows about and coordinate their efforts to gather data most efficiently and make use of the group's collective strengths.

- Helps ensure that the right mix of indicators and metrics are selected. Each setting is unique, and some metrics may resonate more or less for different stakeholders. Local groups should select at least 1 metric for each element – a minimum of 7 – and as many as appropriate for the city, county, or town. Considering the priorities of many groups and interests helps ensure that the assessment captures information that is meaningful to communities, especially those whose perspectives aren't usually shared or considered as part of government decision-making.

- Engages early on the many sectors, agencies and organizations needed to create a Complete Parks system. The assessment should inform the mix of strategies a city, county, or town chooses to align its parks system with the Complete Parks approach. Involving these people and groups from the assessment phase onward is likely to increase their commitment when they are responsible for implementing strategies.

Review the *Complete Parks Model Resolution* for ideas on individuals and groups to engage in assessing a parks system.

Measuring the 7 Elements

ENGAGE: Inclusive, Meaningful, Ongoing Dialogue

Active participation in community life, such as voting and weighing in on policies that affect the neighborhood, is often good for people's health. In one study, people with low political engagement reported poorer health,[3] and adults who volunteer report better physical health and well-being compared to those who don't.[4] Civic engagement can boost social connection and is linked to greater self-esteem and healthy relationships.[5]

Just as government serves the people, parks should support the vision of the people who live near it. Engagement done well can yield long-lasting, more equitable solutions that increase civic pride, and has the potential to create special places that affirm a shared identity and sense of belonging. When a park advances a group's vision for itself, it becomes a central feature of a thriving community and serves as a daily reminder of collective will.

Parks help a community fulfill its vision when people in local government who are responsible for designing, creating, and maintaining parks actively listen to residents and involve them in key decisions, learn something from these conversations, and make different decisions based on community input. When people across local government agencies engage residents in this way in order to develop responsive policies, practices, and projects, outcomes can improve across the board, from high satisfaction with services to increased park use[6] and better public health.

How to Measure: Given the importance of community input to shaping successful parks, the indicators for the Engage element focus on residents' willingness to participate in local government's engagement activities; local government's intention to engage communities; and the effectiveness of local government's engagement efforts. Local governments that make it a priority to engage communities are more likely to be effective at reaching a representative array of residents and boosting participation by demonstrating that their input matters.

CONNECT: Safe Routes to Parks

People are more likely to visit parks when they feel safe getting there.[7] A neighborhood park can be enjoyed only if everyone can easily and safely get there, whether by walking, rolling, biking, taking public transit, or driving a car. People often think of parks as places for physical activity and exercise, but the health benefits could be even greater if people could safely walk, run, or bike on their way to the park and not just after they arrive.

Parks are as much a part of neighborhoods as local schools, housing, and businesses, and creating safe routes to parks can improve the transportation system throughout a city or county.[8] The same routes that people take to parks are used to reach other destinations. Establishing safe, convenient access to parks can also make it easier for people to get to work, run errands, coordinate pick-ups from school or child care, or meet up with friends.

How to Measure: Assessment of the Connect element focuses on accessibility of parks and safe routes to and through parks, regardless of the users' needs or mode of transit. The trails and paths within parks should be integrated into the local transportation network so parks serve as through-routes, not only destinations. Especially in areas without transit infrastructure, proximity to other key destinations and amenities are an important way to measure connectivity and parks access.

LOCATE: Equitable Distribution of Complete Parks

People who live within walking distance of a park are more likely to use parks and have higher physical activity levels than residents who live farther away.[9] The location of a park determines who can access open space and recreation, how the park can be used, and whether it can be integrated into the neighborhood or function as a community hub.

This element also aims to increase park land and recreation spaces in areas that have far fewer parks than other parts of a city or county. This is important because inequitable access to parks is yet another way that people's physical environment can contribute to disease, injury, risk behaviors, and mortality.[10]

How to Measure: The distance people travel to parks is part of assessing the Locate element. Locate indicators also include the amount of park land in a neighborhood and the potential for increasing parkland and recreation spaces. Creative strategies can increase the available venues for exercise, leisure activities, and social interaction, and such strategies are essential in developed areas where open space is limited.

ACTIVATE: Community-Led Park Activities and Programs

A well designed park can improve health by providing spaces for exercise[11] and quiet reflection and relaxation,[12] as well as by facilitating connections among friends, family, neighbors, and other social networks that can provide emotional support.[13,14] Not every park will or should have every possible amenity, but parks should serve many purposes and provide a variety of features that respond to residents' priorities. By accommodating multiple uses, parks can welcome many users and maximize their benefits to communities. Parks can increase property values, attract businesses and in-demand workers, and make a region more appealing,[15] and 85% of Americans say having high-quality parks, playgrounds and open space is important when choosing where to live.[16]

Park users and the broader community may have multiple needs and different priorities depending on time of day, the season, their age or phase of life, and over time. A park that is overly prescriptive quickly becomes obsolete because it cannot reflect the community's changing needs and desires for using park space. To accommodate a wide range of potential users and uses in an ongoing way, parks should have flexible spaces for ad hoc community purposes, in addition to formal programs and fixed features such as play structures or gardens.

How to Measure: Assessing the Activate element gauges people's satisfaction with local park uses and with their participation in park activities. Because people and communities are dynamic and always changing, Activate indicators also examine whether parks can adapt so they're responsive to community needs and desires for the long haul. Rather than espousing cumbersome rules, procedures, or fees that may create barriers or exclude people from using parks, a Complete Parks system encourages people and organizations to use and repurpose their parks so they can easily make the most of parks for generations.

GROW: Parks Maintenance and Ecology

Healthy people need healthy places to live, including clean air, water and soil. Because humans are part of the ecosystem, what's good for the environment is usually also good for people.[17] A Complete Parks system manages parks in a way that is good for the environment and makes parks attractive for long-term use by all kinds of people. Parks improve air quality,[18] provide shade and cool cities prone to extreme heat,[19] and absorb storm water to reduce flooding and property damage.[20] Social connections can be reinforced by parks,[21] which can improve a community's ability to withstand disasters,[22] and parks can serve as staging areas during emergencies.[23]

How to Measure: Assessing the Grow element focuses on environmental stewardship, including parks system practices around recycling and managing waste. It also measures outreach and engagement on ecology and park ecosystems, as well as the environmental conditions in parks, such as air quality.

PROTECT: Safety in and around Parks

Cities, towns, and communities cannot thrive or enjoy good health unless they are safe. Safety is as much a public health issue as a matter for police and the justice system, since violence and fear of violence increase the risk of all sorts of poor physical and mental health outcomes.[24,25] Safety and perceptions of safety can mean very different things to people depending on their experiences. The Protect element addresses the safety concerns of all people.

People in and around parks need to feel safe, or else they will avoid using parks.[26] Overflowing trash and litter, lack of maintenance, or a lack of clean bathrooms or drinking water discourage park use and lead to negative community perceptions that make parks feel unsafe.[27] In a Complete Parks system, park safety is understood within the context of broader community safety and wellness, since people who feel safe in their neighborhood are more likely to feel safe in their local parks.[28]

How to Measure: Assessing the Protect element involves measuring the level of safety in and around parks, as well as some of the conditions and perceptions that support park safety. People are most likely to use parks that feel safe and are clean, well lit, and well maintained,[29,30] so these conditions include park maintenance that addresses litter, graffiti and lighting, as well as alcohol outlet density in the neighborhood.

FUND: The Support Network for a Complete Parks System

$$$ Greater economic inequality within a given population is linked to worse health outcomes for the entire group.[31] Local governments can choose to close the growing gap between affluent households and vulnerable groups struggling to make ends meet by coordinating their efforts and distributing resources equitably throughout their jurisdiction. Deliberately allocating funds and collaborating across sectors to prioritize communities that have further to go to reach optimal health and prosperity have the potential to improve population health and advance health equity.[32,33]

Parks can be supported by blending or braiding funding across departments, since parks often advance the mandates of many other sectors such as public health and community services. Collaboration across the public sector is a defining characteristic of the Complete Parks approach, and various departments can lend support in terms of training and capacity building, community engagement, coordination across sectors, public communications, data systems, and strategic planning, for example.

How to Measure: The indicators for the Fund element examines the distribution of spending and appropriations. The dollar amount, how resources are distributed geographically, and who benefits from the funding are all important aspects of equitable funding. Creating a Complete Parks system requires resources, so assessing the Fund element involves looking at the variety of funding sources for parks.

Guidance on Collecting and Analyzing Data

Gather and Map Data Spatially

Whenever possible, data for metrics should be gathered for each park or by neighborhood. Assessing parks at the neighborhood level has multiple advantages:

- **Equity.** In many places, well-known boundaries segregate affluent neighborhoods, and relying on system-wide or jurisdiction-wide measurements to assess a parks system can mask areas, neighborhoods, or parks where there are notable gaps in the parks network or areas with urgent needs. To gain a more complete picture, data should be gathered by neighborhood whenever possible. Comparing data from each neighborhood will yield a deeper understanding of the variation and disparities within a city or county and can identify areas and groups where concerted attention and investment could have an outsize impact.

- **Efficiency.** Comparative data is key to any Complete Parks analysis. This is in part because local governments can directly act on inequitable distribution of resources across neighborhoods or different parts of the county, even if there are constraints to quickly resolving any other system-wide issues the assessment may reveal. This allows even a city with very limited funding to see how it's performing with the funds that it has, instead of measuring success against areas with more resources or different assets.

- **Deeper analysis and communication.** Mapping metrics can capture patterns of disparity in a visual display. This can reveal areas with concentrations of issues or needed improvements. Mapping metrics can also be a compelling way of communicating those needs with elected officials, partners, community members, and other stakeholders. Metrics that are well-suited for mapping are noted in the lists of indicators for each element.
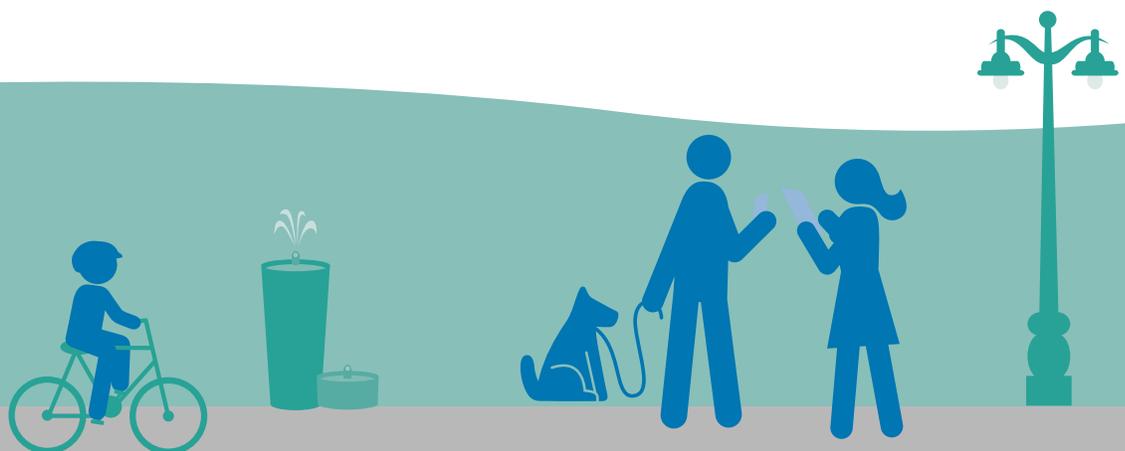
Mapping metrics provides added insights, especially about parks system inequities, when overlaid on the following base maps or map layers:

- **Demographics.** These layers may include population by race and ethnicity, gender, or age distribution; income distribution; populations or households at or below 200% of poverty level; or households without access to a vehicle or without an adult who speaks English well.

- **Priority areas.** These layers can help highlight specific areas where certain health-promoting opportunities are lacking. These could include: neighborhoods with high rates of chronic disease, areas around schools where more than half of the students receive free or reduced-price meals, or areas that lack spaces for physical activity and recreation.

- **Parks and open space network.** Map layers can show the locations of parks and other amenities are located, such as schools, libraries, or grocery stores.

Using a geographic information system, or GIS, can be a good way to record, maintain, and map data spatially. Obtaining and preparing data for spatial analysis and creating maps can be labor-intensive and may require training, but this method enables robust analysis and is effective for visualizing a large amount of information, seeing how different factors overlap or interact with each other, and identifying spatial patterns or disparities. It's likely that some personnel in local planning, transportation, public works, or public health departments have expertise and skills in GIS mapping.

Mapping data using GIS or an open-source mapping platform can be especially valuable in understanding inequities within a parks system, since parks are less accessible and not as well-maintained in areas where people of color and people with low incomes tend to live. Depending on the local context, other underserved groups that warrant additional attention may include seniors; youth and young adults; people with disabilities; the re-entry population; people who are homeless, identify as LGBT+, or don't speak English as their first language; immigrants; or refugees.

Establish a Baseline and Track Data over Time

An important purpose for measuring parks indicators is to track progress toward achieving a Complete Parks system over time. Measuring a set of indicators for the first time generates a baseline, against which all future measurements can be compared. Tracking indicators as strategies are implemented can yield insights into what's working well and what might need adjustment. Over time, the indicators can speak to whether a city, county or town's efforts to create a Complete Parks system are having the desired impact and whether goals are being met.

Use a Variety of Methods to Collect Data

Each method of collecting and analyzing data offers a different set of strengths and weaknesses. The best method for any situation will depend on the capacity and skills level of the people involved, as well as what they're interested in measuring. All of the sample metrics in this document can be measured through at least one of the methods described in this section.

Document Review

Reviewing reports, plans, performance ratings, funding proposals, meeting minutes, web pages, marketing materials, and other documents can provide insight into decisions, processes, and actions that have taken place in the past, are currently being implemented, or are planned for the future. This method is relatively inexpensive, doesn't burden other people, and can provide good background information, but it can be time-consuming if the documents are incomplete, poorly organized, or outdated.

Audits

An audit, sometimes called a site assessment, is ideal for making direct observations of behavior, events, or physical spaces. This method is often used to assess transportation corridors for safety, access, comfort, and convenience, and it can be applied to park and neighborhood spaces too.

Rather than relying on people's willingness or ability to provide accurate information, direct observation involves watching an event or activity unfold in its natural setting. Direct observation accounts for the fact that people who know they're being watched behave differently, since observers should follow social norms and be inconspicuous, not drawing undue attention or inadvertently influencing people's behavior. Direct observation at audits can also be used to gather data about existing infrastructure in and around parks. Because audits rely on people's observations and perceptions, they can introduce or reinforce institutional bias. People – in this case, the observers – involuntarily filter and interpret what they see, and not always strictly empirically. Training for people conducting the audit or observations can help establish consistency and mitigate bias in the data collection.

Although audits can be time-consuming and may require some training to conduct, they are useful for gathering real-time data in situations where existing data are unreliable or outdated, and gaining a better perspective on how people experience the space. Using the "street view" function of online maps can be an alternative way to get information if observers cannot be physically present at the location due to distance, time or capacity constraints, or other reasons.

Surveys

Surveys are effective for gathering data on the perspectives, attitudes and beliefs of residents, community leaders, or government staff. Although hearing directly from the people affected yields valuable insights, qualitative survey responses often require additional analysis. Ways to gather these data include questionnaires, key informant interviews, focus groups, and community forums. It may be helpful to identify ongoing resident engagement processes and established relationships between government staff and community leaders, so that a parks system assessment can complement and build on existing efforts.

Existing Data

Local government departments or community partners may already collect local statistics, including data on health inequities. In addition, publicly available national datasets can be helpful because they are presented in a standard format that facilitates comparison across jurisdictions or geographic areas. Examining data can be a quick way to get a snapshot of current conditions, but the data might not reflect all perspectives; thus, it is important to use both quantitative and qualitative data collection methods in an assessment. When analyzing data, it is also important to consider the time period in which the data were collected and how regularly they are updated in order to assess whether they accurately capture current conditions. People whose primary role involves liaising between local government and communities, or coordinating across city, county, or regional departments can be especially helpful in connecting people who are interested in assessment with unusual stakeholders and relevant local data sources.

Assessment of a parks system requires pulling data from a variety of sources and is enhanced by including diverse perspectives. Collaboration among multiple communities, sectors, and departments can result in a more efficient and robust assessment and yield coherent strategies to improve the parks system as well as other systems such as transit, safety, and public works. Assessing how the parks system interacts with overlapping systems allows parks to be improved in a comprehensive way rather than piecemeal, and by sharing the work of assessing and improving a parks system, everyone in the group can be more efficient and more effective in creating great local parks for residents, workers, and visitors, to enjoy.
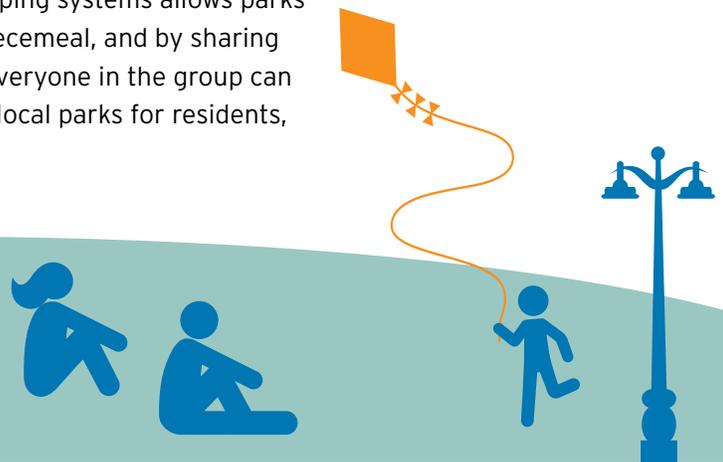
Indicators & Sample Metrics

This section presents indicators and sample metrics for each Complete Parks element. The indicators are factors or variables that express some meaningful aspect of a Complete Parks system. Organized by the relevant indicator, metrics are specific values derived from calculating or combining measurements that gauge progress on a particular indicator. Metrics capture the degree to which the parks system exhibits some important aspect of a Complete Parks element.

As an example, consider "Accessibility of Parks," an indicator for the CONNECT element. One of the metrics that gauges progress on this indicator is "Number of people who visited a park in this system in the last three months." If the number of people who visited a park is high, then it's more likely that the park system performing well on this aspect of the Connect element. Taken together, the metrics and indicators for all 7 elements provide a snapshot of current conditions and assess how closely a given park system matches the characteristics of a Complete Parks system.

Within each element, the Complete Parks indicators are listed in order of importance or relevance for most parks systems. The likely method of data collection is listed in gray for each metric. Special considerations are shown in green boxes. Some Complete Parks elements are closely related, so metrics listed under one element could apply to another. For these metrics, look for icons for other related elements.

LOCATE indicator example:

Related Elements	Complete Parks Indicators	Collection Methods	Special Considerations

1. Distance to parks

a. Percentage of residents who live within a half mile of a park

b. Acres of park per population (for example, per 1,000 residents)

MAPPING

c. Percentage of parks with entrance and wayfinding features (for example, directional signs, pavement markings, and maps) in appropriate languages for the resident population

AUDIT

CONNECT

Research suggests that in order to maximize the MAPPING benefits, residents should live within a half mile of a park, which is approximately equivalent to a ten minute walk. These distance and time thresholds may vary depending on the preferences.
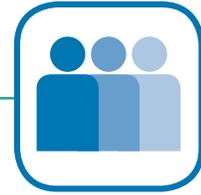
ENGAGE
Inclusive, Meaningful, Ongoing Dialogue

Related Elements	Complete Parks Indicators	Collection Methods	Special Considerations

1. Residents' perception of government engagement

a. Percentage of residents who say that government tries to engage communities to improve decisions and outcomes – disaggregate by age, race, income, gender, or other meaningful demographic

b. Percentage of residents who say that parks are an important issue – disaggregate by age, race, income, gender, or other meaningful demographic

SURVEY

2. Extent of community engagement

a. Frequency of efforts by local government to engage communities on parks

b. Number of methods used by local government to engage communities on parks

c. Percentage of residents reached through community engagement methods (for example, attended outreach events, responded to surveys, or received information) during a specified time period – disaggregate by age, race, income, gender, or other meaningful demographic

d. Average reading level of government materials created to inform the general public OR degree of adherence to adopted plain-language standards

DOCUMENT REVIEW

3. Effectiveness of community engagement

a. Degree to which the demographics of people reached through community engagement processes during 1 year reflect the overall demographics of the county, city, or town

b. Percentage of residents who say that local government does a good job of communicating information about issues that affect them and their neighborhood – disaggregate by age, race, income, gender, or other meaningful demographic

SURVEY
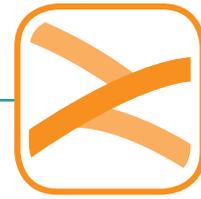
CONNECT
Safe Routes to Parks

Related Elements	Complete Parks Indicators	Collection Methods	Special Considerations

1. Accessibility of parks

a. Percentage of parks in the system that meet the accessibility requirements of the Americans with Disabilities Act

b. Percentage of streets within a half mile of parks with infrastructure that supports walking or bicycling, such as sidewalks or bike lanes

c. Utilization of vehicle and bicycle parking spaces at each park (number available vs. number occupied during peak use)

d. Number of people who visited a park in this system the last 3 months

DOCUMENT REVIEW

AUDIT

SURVEY

A half mile is approximately equivalent to a ten minute walk, which is considered a walkable distance by industry standards. These distance and time thresholds may vary depending on the preferences and abilities of residents and the environment, and communities should adjust their thresholds accordingly. For example, children and older adults may require more time when traveling, and in rural or suburban areas, parks and other amenities may be located further away from each other.

2. Integration of parks and other systems or services

a. Percentage of park entrances within walking distance of key destinations or amenities, such as transit stops, schools, libraries, grocery stores, medical clinics or hospitals, or shopping centers, by neighborhood

b. Number of hours when a park is open and no buses or trains arrive at stops within 2 blocks of the park

c. Percentage of parks programs for which participants could arrive via public transit within 30 minutes of start time and with transit stops within two blocks of park entrance

d. Number of cross-promotional materials between parks and transportation systems such as a greenways network, carpools or shuttles, made available to the general public

MAPPING

DOCUMENT REVIEW

Especially in places without a transit system, one way to measure connectivity of parks is proximity to other community amenities, however the community defines this.

3. Safety of routes to and through parks

a. Risk of traffic-related injuries or collisions for all modes of transportation (high, medium, or low risk)

b. Annual number of traffic collisions within a half mile of parks, for all modes of transportation – disaggregate people involved in collisions by age, race, income, gender, or other meaningful demographic

AUDIT

DATA ANALYSIS

Although some parks may be show qualities of a Complete Park within the park boundaries, people may encounter unsafe conditions on their way to and from the park, such as high traffic volumes and wide crossings, especially in urban areas. This metric can help identify ways to prevent traffic-related risks and enhance the park experience for users.
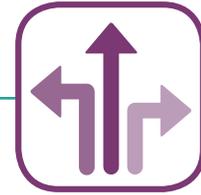
LOCATE
Equitable Distribution of Complete Parks

Related Elements	Complete Parks Indicators	Collection Methods	Special Considerations

1. Distance to parks

a. Percentage of residents who live within a half mile of a park

b. Acres of park per population (for example, per 1,000 residents)

MAPPING

CONNECT

c. Percentage of parks with entrance and wayfinding features (for example, directional signs, pavement markings, and maps) in appropriate languages for the resident population
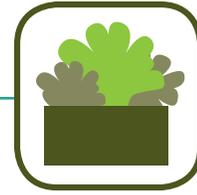
AUDIT

2. Potential to increase park space

a. Inventory of possible shared use sites, such as schools, water reservoirs or basins, and churches

DOCUMENT REVIEW

b. Acreage and quantity of public vacant lots and/or underutilized public land

DATA ANALYSIS

Research suggests that in order to maximize the benefits, residents should live within a half mile of a park, which is approximately equivalent to a ten minute walk. These distance and time thresholds may vary depending on the preferences and abilities of residents and the environment, and communities should adjust their thresholds accordingly. For example, children and older adults may require more time when traveling, and in rural or suburban areas, parks and other amenities may be located further away from each other.

ACTIVATE
Community-Led Park Activities and Programs

Related Elements	Complete Parks Indicators	Collection Methods	Special Considerations

1. Satisfaction with uses of parks

a. Percentage of residents and visitors who are satisfied with nearby parks – disaggregate by age, race, income, gender, or other meaningful demographic

b. Percentage of residents and visitors who say they are able to use nearby parks the way they'd like – disaggregate by age, race, income, gender, or other meaningful demographic

SURVEY

It can be helpful to stratify ALL Activate indicators by types of parks (for example, pocket, neighborhood, community, regional, special use, open space, or greenbelt), as different types of parks may be intended to serve different purposes.

2. Activity levels in parks

a. Degree to which the demographics of parks program participants reflects the overall demographics of the county, city, or town

b. Number and types of uses of parks

DOCUMENT REVIEW

AUDIT

Examining the demographics of park program participants is recommended because parks in low-income neighborhoods or where many people of color live tend to have fewer recreation programs than parks in more affluent neighborhoods where mostly white people live.

3. Inclusiveness of parks

CONNECT

LOCATE

a. Percentage of park signs and communication materials that are in languages relevant to the resident population

b. Number and types of rules or procedures likely to present barriers to park use, such as the requirement of keys kept off-site to access park courts, fields or bathrooms, or reservation systems that are only available when most people work, for example.

DOCUMENT REVIEW

Some rules or procedures that may seem burdensome to some people may provide benefits to others, so it is important to consider the intent of the rules or procedures for this metric. For example, restrictions on where dogs are allowed in parks could help some people feel more comfortable, but limit others in using the park. After conducting a document review to identify potential rules or procedures that present barriers to park use, a survey could be administered to park users as well as park service providers or local government staff about perceived barriers. The results could be compared to see how perceptions might align or differ.

GROW
Parks Maintenance and Ecology

Related Elements	Complete Parks Indicators	Collection Methods	Special Considerations

1. Environmental stewardship practices in parks

a. Number of policies or practices for improving environmental responsibility in the parks system

b. Number of sustainability design features in each park– for example, tree coverage, design for storm water infiltration systems, energy-efficient lighting, drought-tolerant landscaping

DOCUMENT REVIEW

c. Percentage of parks with a waste management plan to minimize environmental impact

d. Percentage of parks with recycling bins that are visible, well-marked, and easy to locate

AUDIT

2. Environmental outreach in parks

a. Percentage of parks with environmental education programs, such as community gardens, cleanup events, and partnerships with schools science departments, ecology non-profit organizations, farmers' markets, and/ or nursery or gardening businesses

DOCUMENT REVIEW

3. Environmental conditions of parks

a. Number of days annually when air quality was rated "unhealthy" or "unhealthy for sensitive groups," by neighborhood or zip code

DATA ANALYSIS

An equity analysis is recommended for ALL Grow Indicators, because research suggests that parks maintenance and basic parks amenities may be more important to communities of color and people living in low-income neighborhoods than other Complete Parks elements. Black and Latino residents in Houston, for example, were concerned about poor park maintenance and the lack of restrooms and water fountains.* They cared most about improving basic services in existing parks, whereas mostly white, affluent survey respondents prioritized the Connect element.

* Smiley KT, Sharma T, Steinberg A, et al. More Inclusive Parks Planning: Park Quality and Preferences for Park Access and Amenities. Environmental Justice. 2016;9(1):1-7.

PROTECT
Safety In and Around Parks

Related Elements	Complete Parks Indicators	Collection Methods	Special Considerations

1. Level of safety in and around parks

GROW →

a. Number of days that park equipment has been overdue for maintenance or replacement, by neighborhood

b. Crime rate or violent crime rate by neighborhood

CONNECT →

c. Injury types and rates in and around parks

d. Presence of park design features that support safety

DOCUMENT REVIEW

DATA ANALYSIS

AUDIT

An equity analysis is recommended for ALL Protect Indicators, because research suggests that safety concerns are more common for parks that serve communities of color and low-income neighborhoods, compared to parks in mostly white or more affluent areas.

2. Conditions and perceptions that influence park safety

a. Alcohol outlet density

GROW →

b. Number of reported complaints related to park maintenance or safety – disaggregate by age, race, income, gender, or other meaningful demographic

GROW →

c. Number of staff and volunteer hours spent per month on park maintenance

d. Percentage of park budget or annual budget allocated for maintenance, by neighborhood or park

e. Percentage of residents who say they feel safe in their local park – disaggregate by age, race, income, gender, or other meaningful demographic

MAPPING

DOCUMENT REVIEW

SURVEY

FUND

The Support Network for a Complete Parks System

$$$

Related Elements	Complete Parks Indicators	Collection Methods	Special Considerations

1. Distribution of park spending and appropriations

a. Per capita expenditure on parks by neighborhood

b. Percentage of annual budget designated for parks and how it is spent, by neighborhood

2. Operational support for parks

a. Diversity of funding sources for parks, including public, private, and philanthropic sources

b. Percentage of funding allocated for coordination efforts among sectors, departments and community groups, and/or for local government staff positions where coordination is a primary responsibility

DOCUMENT REVIEW

Data Sources and Tools

Mapping

- Guide for Measuring Alcohol Outlet Density
- Improving Public Health through Public Parks and Trails: Eight Common Measures

Document Review

Potential resources to find information related to Complete Parks indicators and metrics include:

Plans

- Bicycle, pedestrian, and trails master plans
- Comprehensive plans
- Neighborhood or area-specific plans
- Parks and recreation master plans
- Safe Routes to Schools plans
- Vision Zero Action Plans

Other Documents

- Annual reports
- Community needs assessments
- Health impact assessments
- Job descriptions
- Social media
- Meeting minutes
- Websites

Audit Tools

- Audit guidelines, checklists and resources, by Pedestrian and Bicycle Information Center
- Community Park Audit Tool (CPAT), by Active Living Research
- Get to Know Your Neighborhood With a Walk Audit, by Safe Routes to School National Partnership
- Pedestrian Environmental Data Scan (PEDS), by Kelly Clifton et al., University of Maryland
- PIN3 Neighborhood Audit Instrument, by Kelly Evenson et al., University of North Carolina
- Rural Active Living Assessment (RALA), by David Hartley et al., Maine Rural Health Research Center, University of Southern Maine
- Rural Active Living Perceived Environmental Support Scale (RALPESS), by Renee Umstattd et al., Baylor University
- Safe Routes to Parks Action Framework, by National Recreation and Park Association and Safe Routes to School National Partnership
- System for Observing Play and Leisure Activity in Youth (SOPLAY), by Thomas L. McKenzie, San Diego State University

Survey Design

- Designing and Conducting Health Surveys: A Comprehensive Guide, by Lu Ann Aday and Llewellyn J. Cornelius

Existing Data

Publicly Available Data

Data sets that cover multiple topics are listed first, followed by data sets that are specific to one or more Complete Parks elements.

- American Community Survey
- City Parks Facts
- Data.gov
- National Health Interview Survey
- US Census
- Fatality Analysis Reporting System
- Transportation and Health Tool
- AirCompare
- Air Quality Index
- Uniform Crime Reporting Statistics

Data Shared by Partners

In addition to parks and recreation, other partners might include:

- Community and neighborhood service providers
- Economic and workforce development agencies
- Educational institutions
- Elected officials
- Fire and law enforcement agencies
- Housing authorities and developers
- Planning departments
- Public health departments
- Public works departments
- Residents, community-based groups, advocates, activists, and organizers
- Social service providers
- Transportation departments
- People who liaise between local government and communities
- People who coordinate efforts across city, county, or regional level departments

Resources

A Comparison of Four Audit Tools to Assess the Rural Built Environment for Active Travel: Which is best for community-led initiatives?
Kaycie Stushek, Department of Urban and Regional Planning, University of Wisconsin – Madison, WI

Creating Park Signage
Project for Public Spaces

Creating Safe Park Zones for Communities in Illinois
Active Transportation Alliance

Facility Design
Pedestrian and Bicycle Information Center

Health Equity and Community Engagement Reports
Bay Area Regional Health Inequities Initiative

Healthy Parks Healthy People Community Engagement eGuide
National Parks Conservation Association

Interactive Maps and Data
as part of the Los Angeles Countywide Comprehensive Parks & Recreation Needs Assessment, by Los Angeles County Department of Parks and Recreation

Malibu Parks Public Access Enhancement Plan: Park and Trail Accessibility Design Guidelines
Mountains Recreation and Conservation Authority

Park Equity Maps and Analyses
GreenInfo Network

Safe Routes to Parks Action Framework
National Recreation and Parks Association and Safe Routes to School National Partnership

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