

# GUIDANCE

## SFI URBAN AND COMMUNITY FOREST

### SUSTAINABILITY STANDARD



## TABLE OF CONTENTS

Introduction and Scope.....	3
Objective 1: Community, People, and Indigenous Participation .....	4
Objective 2: Human Health and Well-being .....	8
Objective 3: Protection and Conservation of Biodiversity.....	10
Objective 4: Stewardship of Natural Resources including Air, Water, and Soil .....	13
Objective 5: Urban and Community Forest and Tree Health and Vitality.....	15
Objective 6: Special Sites, including Natural Areas.....	18
Objective 7: Climate-Smart Management.....	20
Objective 8: Urban and Community Forest Planning .....	23
Objective 9: Management and Care of Urban and Community Forests and Trees .....	25
Objective 10: Disaster Readiness, Response, and Recovery.....	30
Objective 11: Capacity-Building .....	32
Objective 12: Urban Wood and Community Forest Utilization .....	35
Objective 13: Communications .....	37
Objective 14: Research, Science, and Technology.....	38
Objective 15: Legal and Regulatory Compliance including Recognizing Indigenous Peoples’ Rights .....	41
Objective 16: Reporting .....	43
Definitions.....	44

## Guidance for SFI Urban and Community Forest Sustainability Standard

### Introduction and Scope

This guidance document is intended to assist *organizations* in understanding and implementing new and existing provisions in the *SFI Urban and Community Forest Sustainability Standard*. This document provides additional information that may help *organizations* make management decisions to meet the *SFI Urban and Community Forest Sustainability Standard*. *SFI* routinely researches ways to improve the functionality of its work, thus this document may be updated over time. **This guidance document is informative in nature and the guidance information contained below is not normative.**

The *SFI Urban and Community Forest Sustainability Standard* promotes sustainable urban and community forests based on 16 objectives. This standard is appropriate for *organizations* that own, manage, or are responsible for urban and/or community forests. These *organizations* can come from all facets of the urban and community forest sector including but not limited to: governmental *organizations* (i.e. municipalities, counties, states, provinces), *Indigenous Peoples*, non-governmental *organizations*, community groups, healthcare *organizations*, educational *organizations*, and corporate *organizations*. This standard is based on 5 guiding **PRINCIPLES**:

- *Urban and community forests* and trees are vital for community well-being, health, *resiliency*, and sustainability.
- *Urban and community forests* and trees and their associated benefits should be accessible and available to everyone.
- *Urban and community forests* and trees depend upon understanding, awareness, appreciation, stewardship, and engagement by communities and people in order to thrive.
- *Urban and community forests* and trees require proper planning, care, and management to optimize benefits and *minimize* risks.
- *Urban and community forests* and trees are *nature-based solutions* to pressing issues and essential *green infrastructure*.

## Objective 1: Community, People, and Indigenous Participation

To strengthen the community, enhance local economies, broaden public engagement, respect diverse perspectives, facilitate *Indigenous* participation, and ensure equitable access for all to the many benefits of *urban and community forests*.

- **Performance Measure 1.1:** *Organization* actively seeks and promotes public engagement.

### Guidance:

*Organization* should recognize people in the community who are champions of the *urban forest* and its resources and benefits.

LEAF: [Urban Forest Champion](#)

Tree Canada: [Awards](#)

Urban and Community Forestry Society: [Community Awards](#)

International Society of Arboriculture Award Programs: [ISA Member-Recognition](#)

*Organization* should work with cross-sector partners to create educational programs, policies, incentives, and regulatory measures aimed at building social and ecological resilience via trees and *nature-based solutions*.

Food and Agriculture Organization of the United Nations (FAO): [Guidelines on Urban and Peri-Urban Forestry](#)

Project Learning Tree: [Resources](#)

*Organization* should demonstrate that its urban forestry goals are tied to social and environmental justice efforts, economic development, educational and cultural enhancement initiatives, and active transportation efforts.

Vibrant Cities Lab: [Social, Economic, and Environmental Benefits of Urban Forests](#).

*Organization* could promote food production and green entrepreneurship strategies to build social resilience.

Food and Agriculture Organization of the United Nations (FAO): [Green Cities Initiative](#)

- **Indicator 1.1.1:** *Organization* identifies opportunities and events for community members to support and celebrate trees.

**Guidance:**

*Organization* could participate in Arbor Day Foundation’s Tree City USA, Tree Cities of the World, or affiliate programs.

*Organization* could celebrate Arbor Day or include urban forests and trees in Earth Day celebrations.

Arbor Day Foundation: [Celebrate Arbor Day: Celebration Ideas](#)

- **Indicator 1.1.2:** *Organization* has a body of *interested parties* that actively participates in *managing* community trees.

**Guidance:**

*Organization* could maintain a Tree Board.

Arbor Day Foundation: [Tree City USA Bulletin #54: How to Grow a Great Tree Board](#)

Example: City of Trees Challenge: [Boise Tree Captains](#)

- **Performance Measure 1.2:** *Organization* respects diverse perspectives.
  - **Indicator 1.2.1:** *Organization* seeks and engages communities with diverse cultural and socioeconomic backgrounds.

**Guidance:**

Vibrant Cities Lab Toolkit: [Build a Stakeholder Coalition](#)

Policy Link: [Community Engagement Guide for Sustainable Communities](#)

Example: City of Edmonton: [Ribbon of Green Public Engagement and Communications Plan](#)

- **Indicator 1.2.2:** *Organization* includes diverse community values, experiences, and perspectives in planning, management, and educational opportunities.

**Guidance:**

*Organization* could hold conversations, assemble focus groups, or survey diverse populations regarding urban forests and trees.

Examples: City of Kitchener (Canada): [Urban Forest Strategy](#)

City of Bellingham (United States): [Urban Forestry Management Plan Engagement Strategy](#)

- o **Indicator 1.2.3:** Organization demonstrates cultural competency with regard to diverse communities.

Guidance:

*Organization* should facilitate access to cultural education and training for employees and volunteers.

Example: Project READY: [Reimagining Equity and Access for Diverse Youth](#)

- **Performance Measure 1.3:** *Organization* integrates *Indigenous Peoples'* knowledges and perspectives.

Guidance:

*Organization* could have active projects that increase access to land and water for healing, celebration, learning, and growth.

Example: McGill University: [Partnership agreement between McGill University's Gault Nature Reserve and the Grand Conseil de la Nation Waban-Aki](#)

National Healing Forests Initiative: [Projects](#)

['We All Go Back to the Land: The Who, Why, and How of Land Acknowledgements'](#) written by Suzanna Keeptwo

- o **Indicator 1.3.1:** *Organization* provides meaningful opportunities for *Indigenous Peoples* to participate in decision making, through processes that respect their representative institutions and utilize appropriate protocols.

Guidance:

Government of Canada: [Treaties and agreements](#)

United States Agency for International Development (USAID): [Indigenous Peoples](#)

Project Learning Tree Sault College: [Building Respectful Forest-Focused Relationships with Indigenous Peoples](#)

Evergreen: [Civic-Indigenous Placekeeping and Partnership Building Toolkit](#)

Example: The City of Montreal (Canada): [Reconciliation Strategy](#)

- o **Indicator 1.3.2:** *Organization communicates with Indigenous Peoples in a manner that enables them to:*
  - understand and respect traditional forest-related knowledge.
  - identify and protect spiritually, historically, or culturally important sites.
  - address the use of non-timber forest products of value.
  - respond to inquiries and concerns received.

Guidance:

Government of British Columbia: [Indigenous Engagement](#)

Government of Canada: [Indigenous engagement and representatives](#)

Example: City of Toronto (Canada): [Planning Traditional and Prescribed Burns in High Park to Sustain and Reinvigorate Threatened Habitat](#)

- **Performance Measure 1.4:** *Organization ensures equitable access to urban and community forests, trees, and their associated benefits.*

Guidance:

Tree Philly: [Environmental Justice Report](#)

UBC Sustainability The Restorative Natural Area Index: [Not All Green Space is Created Equal – or Equally Accessible to All](#)

- o **Indicator 1.4.1:** *Demonstrates that the program prioritizes tree equity for all interested parties.*

Guidance:

*Organization* should use a metric to quantify tree canopy within diverse communities. A tool such as [treeequityscore.org](#) from American Forest could be used to analyze and inform their urban forest equity management.

Tree Canada: [Equitable Access to Trees](#)

Nature Canada Tree Equity: [Canada's Urban Forests Bringing the Canopy to All](#)

- o **Indicator 1.4.2:** *Organization uses a metric to quantify equitable access to urban and community forests, green spaces, and their associated benefits.*

Guidance:

Trust for Public Land: [2022 ParkScore® Index](#)

University of Toronto, School of Public Health: [Healthy Plan City](#)

## Objective 2: Human Health and Well-being

To promote human and community health and well-being through equitable management and distribution of tree and forest related benefits, fair and safe access to and within green spaces, and nature-based recreational opportunities.

### Guidance:

The connection between *urban forests*, trees, and human health continues to grow. An *organization* should use resources such as Vibrant Cities Lab's [Urban Forestry Toolkit](#) or The Southern Group of State Foresters' [Healthy Trees, Healthy Lives](#) to inform their programs.

- **Performance Measure 2.1:** *Organization* includes human health and well-being in assessment, planning, and management efforts.
  - **Indicator 2.1.1:** *Organization* identifies how human health and well-being are addressed in *urban or community forest*-related resource assessments and *strategies*.

### Guidance:

*Organization* could include heat-zone maps and public health data in their assessment and management studies. (i.e. Texas Tree Foundation: [Urban Heat Island Management Study](#))

USDA Forest Service: [Climate adaptation actions for urban forests and human health](#)

IUFRO: Expert Panel on Forests and Human Health 2023: [Global Forest Expert Panels \(GFEP\) Programme](#)

Trees Actions and Design Group (TDAG) First Steps in Urban Heat for Built Environment Practitioners: available on [University of Birmingham ePapers Repository](#)

- **Indicator 2.1.2:** *Organization* demonstrates how human health and well-being aspects are integrated in forest- and tree-related management decisions.

### Guidance:

One Tree Planted: [16 Health Benefits of Trees and Forests](#)

The Nature Conservancy: [6 Ways Trees Benefit People](#)

Healthy Trees, Healthy Lives: [Health Benefits](#)

Greenbelt Foundation: [Health-Informed Heat Mitigation Approach: Case Study of the Regional Municipality of York](#)



- **Performance Measure 2.2:** *Organization* promotes human health benefits of forests, trees, and greenspaces.
  - **Indicator 2.2.1:** *Organization* uses multiple approaches to communicate the connection between human health and well-being and forests and trees to public and internal audiences.

Guidance:

Nature Quant: [Nature Score](#)

World Health Organization: [Urban Green Spaces: a brief for action](#)

European Environment Agency: [Who benefits from nature in cities? Social inequalities in access to urban green and blue spaces across Europe](#)

Canadian Coalition for Green Health Care: [Canadian Health Care Forests](#)

- **Performance Measure 2.3:** *Organization* has a system or systems to include the urban or community forest in recreational, commuting, and travel opportunities.
  - **Indicator 2.3.1:** *Organization* has accessible and welcoming parks and/or greenspaces.

Guidance:

Example: City of Surrey: [Accessibility Action Plan](#)

Loyola Marymount University: Biernacka, Magdalena and Kronenberg, Jakub (2019) [Urban Green Space Availability, Accessibility and Attractiveness, and the Delivery of Ecosystem Services](#)

- **Indicator 2.3.2:** *Organization* has and implements *strategies* to ensure equitable access and utilization of parks and greenspaces.

Guidance:

Hands, Angela & Stimpson, Aimee & Ridgley, Harmony & Petrokofsky, Carl [Improving access to greenspace A new review for 2020](#)

Urban Land Institute: [10 Principles for Enhancing Equitable Access to Parks](#)

Park People: [Ensuring Inclusive, Accessible and Welcoming Large Urban Parks in Canada](#)

- **Indicator 2.3.3:** *Organization* includes *urban or community forests* and trees in travel, commuting, and mobility plans and *strategies*.

Guidance:

*Organization* could use a resource such as Vibrant Cities Lab: [Transportation](#) to improve their urban forest connection to transportation.

Example: City of Grand Rapids: [Green Grand Rapids Plan](#)

### Objective 3: Protection and Conservation of Biodiversity

To *protect, conserve, and improve biodiversity through urban and community forestry, including threatened and endangered species, wildlife habitat, trees, forests, and associated ecological systems.*

Guidance:

Example: City of Mountain View: [Biodiversity and Urban Forest Plan](#)

Example: City of Saanich: [Biodiversity Conservation Strategy](#)

- **Performance Measure 3.1:** *Organization incorporates the conservation of biological diversity at urban or community forest, urban park, and/or street-tree levels.*
  - **Indicator 3.1.1:** *Organization develops criteria and implements practices, as guided by regionally based best scientific information, to retain urban or community forest level wildlife habitat elements.*

Guidance:

*Wildlife habitat* elements can include snags, stumps, mast trees, down woody debris, den trees, and nest trees.

International Society of Arboriculture Western Chapter: [Tree Care for Birds Best Management Practices](#)

University of California, Davis: [Forest and Rangeland Indicators](#)

- **Indicator 3.1.2:** *Organization works individually or collaboratively to support a diversity of native tree and/or forest types including a diversity of ages and/or sizes that enhance biological diversity at the urban and/or community scale.*

Guidance:

*Organization* could document diversity of forest cover types and age or size classes at the individual ownership or urban or community forest tenure level, and where credible data are available at the urban and community level.

Climate Change Response Framework: [Urban Forests](#)

ISA International Society of Arboriculture: [An Urban Forest Diversification Software to Improve Resilience to Global Change](#)

Université de Québec and Université de Montréal: [SylvCiT](#) tree diversity and mapping online software (available in English)

- **Indicator 3.1.3:** *Organization* participates in or incorporates the results of state, provincial, territorial, or regional *conservation* planning and priority-setting efforts to conserve *biological diversity* through *urban or community forest* management.

Guidance:

National Association of State Foresters: [Forest Action Plans](#)

Islands Trust: [Conservation Planning](#)

Government of Ontario: [Provincial parks and conservation reserves planning](#)

- **Indicator 3.1.4:** *Organization* participates in *programs* and demonstrates activities to limit the introduction, spread, and impact of *invasive* exotic insects, animals, and plants that directly threaten or are likely to threaten *native* plant and animal communities.

Guidance:

United States Department of the Interior: [Invasive Species Control](#)

Ontario's Invading Species Awareness: [Programs](#)

We Conserve PA: [Invasive Species Management Program](#)

- **Performance Measure 3.2:** *Organization* protects threatened and endangered species, *Forests with Exceptional Conservation Values*, and *old-growth forests* or trees.
  - **Indicator 3.2.1:** *Organization* protects threatened and endangered species.

Guidance:

International Institute for Sustainable Development: [Protecting Endangered Species](#)

Endangered Species Coalition: [15 Ways to Help Protect Endangered Species](#)

- **Indicator 3.2.2:** *Organization* locates and *protects* known *sites* of flora, fungi, and fauna associated with viable occurrences of *critically imperiled* and *imperiled* species and communities.

Guidance:

*Organization* could create plans for protection independently or collaboratively and may include management by *organization*, cooperation with other *interested parties*, or use of easements, *conservation* land sales, exchanges, or other *conservation* strategies.

NatureServe: [Conservation Status Assessment](#)

Society for Ecological Restoration: [Certified Ecological Restoration Practitioner \(CERP\) Program](#)

The United States Geological Survey: [Protected Areas Database for the United States](#)

- **Indicator 3.2.3:** *Organization* supports or participates in plans or *programs* for the *conservation of old-growth forests* or trees, if applicable.

Guidance:

Nature Trust British Columbia: [The Importance of Old Growth Forests](#)

US Department of Agriculture Forest Service: [Old Growth Forests](#)

Old Growth: [Forest Network](#)

[Old Growth Urban Forests](#), book by Robert E. Loeb

- **Performance Measure 3.3:** *Organization* manages *wildlife habitat* and contributes to the *conservation of biological diversity*.

Guidance:

*Organization* could utilize relevant programs such as the Wildlife Habitat Council's [Conservation Certification Standard](#) to illustrate their conservation efforts.

- **Indicator 3.3.1:** *Organization* collects information on *Forests with Exceptional Conservation Value* and/or other *biodiversity*-related data through *inventory*, mapping, and/or participation in external *programs*.

Guidance:

*Organization* could utilize programs such as [NatureServe](#), state or provincial heritage *programs*, or other credible systems. Such participation may include providing non-proprietary scientific information, time, and assistance by staff, or in-kind or direct financial support.

- **Indicator 3.3.2:** *Organization* implements *strategies* to incorporate research results and field applications of *biodiversity* and ecosystem research into *urban or community forest* management decisions.

Guidance:

Nature Communications: [Strategically growing the urban forest will improve our world](#)

Park People: [Rewilding the City: Solutions for Urban Biodiversity](#)

#### Objective 4: Stewardship of Natural Resources including Air, Water, and Soil

To consider the impact of the *urban and community forest* and *organization's program* on natural resources including air, water, and soil.

- **Performance Measure 4.1:** *Organization* meets or exceeds all applicable water and air quality laws, regulations, and meets or exceeds *best management practices* developed under government–approved water and air quality *programs*.

Guidance:

United States Environmental Protection Agency: [Water Quality Criteria](#)

United States Environmental Protection Agency: [Air Quality Management Process](#)

Canadian Council of Ministers of the Environment: [Canadian Environmental Quality Guidelines](#)

- **Indicator 4.1.1:** *Organization* implements water- and air-quality *best management practices* during all phases of management activities.

Guidance:

United States Environmental Protection Agency: [Water Management Plans and Best Practices at EPA](#)

Government of Ontario: [Best Practices for Source Water Protection](#)

United States Environmental Protection Agency: [Managing Air Quality - Control Strategies to Achieve Air Pollution Reduction](#)

- **Indicator 4.1.2:** *Organization* monitors implementation of overall *best management practices* to protect air, water, and soil.

Guidance:

University of Wyoming: [Best Management Practices Monitoring Guide for Stream Systems](#)

USDA Forest Service: [Soil and Water: Best Management Practices Monitoring](#)

Arkansas Agriculture Department, Forestry Division: [Best Management Practices – Water Quality and Monitoring Reports](#)

- **Performance Measure 4.2:** *Organization* implements water, wetland, and riparian protection measures during *urban or community forest* management.

Guidance:

*Organizations* should consider soil type, terrain, vegetation, ecological function, harvesting system, governmental *best management practices* and guidelines, and other applicable factors. Plans that address wet-weather events to maintain water quality (e.g., urban forest inventory systems, wet-weather tracts, definitions of acceptable operating conditions).

Government of British Columbia: [Riparian Areas Protection Regulation \(RAPR\)](#)

*Organization* could utilize maps of rivers, streams, lakes, *wetlands*, and other water bodies as specified in governmental *best management practices* and, where appropriate, identifies them on the ground.

Government of Canada: [Water sources: Wetlands](#)

- **Indicator 4.2.1:** *Organization* employs strategies to effectively manage rivers, streams, lakes, *wetlands*, watersheds, other water bodies, and *riparian areas* to protect, preserve, conserve, maintain, restore, and/or enhance their natural functions.

Guidance:

Government of Ontario: [Environmental guidelines for access roads and water crossings](#)

Green Infrastructure Ontario Coalition: [Ontario's Wetland Conservation Society](#)

United States Environmental Protection Agency: [Wetlands Protection and Restoration](#)

- **Indicator 4.2.2:** *Organization* documents and implements *strategies* to manage and *protect* rivers, streams, lakes, *wetlands*, other water bodies, and *riparian areas*, and to *manage stormwater*.

Guidance:

Colorado Riparian Association: [Riparian Areas: Functions and Strategies for Management](#)

United States Environmental Protection Agency: [Green Infrastructure](#)

US Water Alliance: [One Water Roadmap: The Sustainable Management of Life's Most Essential Resource](#)

- **Performance Measure 4.3.** *Organization* implements a *strategy* to *protect* soil quantity, quality, and health during *urban or community forest* management.

Guidance:

Example: City of Dallas, Texas: [Landscape and Tree Manual](#), See Section 5: [Urban Soils](#)

- **Indicator 4.3.1:** *Organization* specifies appropriate soil volumes and quality for *sites* and species during *planting* and development.

Guidance:

‘[Up By Roots](#)’: written by James Urban, FASLA

Example: City of Toronto Green Standard: Ecology & Biodiversity – [Tree Planting Areas and Soil Volume](#)

Example: City of Seattle: Right-of-Way Improvements Manual: Design Standards - [3.7 Street Trees](#)

- **Indicator 4.3.2:** *Organization* implements *best management practices* to *protect* soils from degradation and/or rehabilitate damaged soils.

Guidance:

*Organization* could adopt and utilize the latest edition of [Best Management Practices - Soil Management for Urban Trees](#), by Bryant C. Scharenbroch and E. Thomas Smiley in their *program*.

Arbor Day Foundation: [The Dish on Dirt: Why Soil Matters to Tree Health](#)

Tree People: [Healthy Soils for Healthy Communities Initiative](#)

*Organization* should implement a continual soil improvement *program* that utilizes natural or augmented organic matter cycling, and tests soils prior to fertilization and modification.

*Organization* should *minimize* negative effects of soil compaction through the use of protective measures during construction, utilizing engineered solutions, or using structural soils.

Bartlett Tree Experts: [Soil for Urban Tree Planting](#)

Virginia Tech: [Soil Profile Rebuilding Specifications](#)

## **Objective 5: Urban and Community Forest and Tree Health and Vitality**

To ensure the long-term viability of *urban and community forests* by maximizing their health, longevity/age, *diversity*, *resilience*, and size to optimize benefits and resource availability and use.

- **Performance Measure 5.1:** *Organization* uses *integrated plant management* or *plant health care* procedures during operations.

Guidance:

*Organization* could implement a plant focused management *strategy* to address health and vitality. Resource [Using IPM in the Landscape](#) from Washington State University.

Example: City of Vancouver [Integrated Pest Management Policy](#)

- **Indicator 5.1.1:** *Organization* implements holistic *strategies* that consider tree and plant needs, including spacing, water requirements, pest associations, and proper fertility.

Guidance:

International Society of Arboriculture: TreesAreGood.org: [Tree Health](#)

Tree Canada: [How We Can Nurture Our Trees](#)

- **Indicator 5.1.2:** *Organization* utilizes integrated management options where appropriate, such as prescribed fire, rotational grazing, and *natural regeneration* to increase *forest health* and vitality.

Guidance:

British Columbia FireSmart: [Cultural Burning & Prescribed Fire BC](#)

University of Minnesota: [Goat-grazing for invasive plant control](#)

Province of Ontario: [Silvopasture for Ontario](#)

- **Performance Measure 5.2:** *Organization* has developed strategies to guide *planting* and establishment to enhance *urban or community forest* health and vitality.
  - **Indicator 5.2.1:** *Organization* ensures that tree species and specimens are well-suited to local growing conditions, are climate-adapted, represent diverse species, and are not *invasive* or otherwise destructive.

Guidance:

ISA Trees Are Good [Choosing the Right Tree](#)

Arbor Day Foundation: [Choosing The Right Tree](#) , [Tree City Bulletin](#), [Let's Diversify Community Forests](#)

Example: City of Guelph: [One Canopy Tree Planting Strategy](#)

- **Indicator 5.2.2:** *Organization* selects tree *planting sites* that support tree growth and performance.

Guidance:

United States Department of Agriculture Forest Service: [Urban and Community Forest Program Site Selection for Tree Planting within a State Improvement Plan](#)

Arbor Day Foundation: [Tree City Bulletin, Make Room for Trees](#)

Landscape Ontario & Vineland Research and Innovation Centre: [Ontario Landscape Tree Planting Guide](#)

Green Municipal Fund – Federation of Canadian Municipalities: [Factsheet: Site selection and preparation](#)

Hydro-Québec: [Choose the Right Tree or Shrub tool](#)



- **Indicator 5.2.3:** *Organization* utilizes a regular, proactive tree health monitoring program to assess tree stress and survival.

Guidance:

Ecological Research Institute: [Monitoring and Managing Ash \(MaMA\)](#)

United States Department of Agriculture Forest Service: [Urban Tree Monitoring: A Resource Guide](#) and companion document [Urban Tree Monitoring: A Field Guide](#)

- **Performance Measure 5.3:** *Organization* facilitates the coexistence of trees and the built environment.

Guidance:

*Organization* could adopt and implement latest edition of [Best Management Practices – Integrated Vegetation Management](#), by Randall H. Miller.

Trees and Design Action Group (TDAG): [Trees in Hard Landscapes](#)

- **Indicator 5.3.1:** *Organization* ensures that the built environment and trees needs are considered in *urban or community forest* planning and maintenance operations.

Guidance:

*Organization* should have a process to prune or remove trees, as necessary, to *minimize* conflict with infrastructure and critical lines of sight.

Example: City of Cincinnati (United States): [Urban Forestry/Street Trees](#)

Example: District Department of Transportation (United States): [Urban Forestry Division Services](#)

Example: Town of Oakville (Canada): [Town Tree Maintenance](#)

- **Indicator 5.3.2:** *Organization* modifies or removes the built environment, when feasible, to reduce conflicts and improve forest and tree health.

Guidance:

Florida Urban Forestry Council: [Quarterly Newsletter 2013 Issue- Reducing Conflicts Between Urban Infrastructure and Trees](#)

Vibrant Cities Lab: [Engineered Systems](#) and [Complete Steets](#)

Casey Trees: Tree Space Design: [Growing the Tree Out of the Box](#)

- **Performance Measure 5.4:** *Organization protects urban and community forests and trees from damaging agents.*
  - **Indicator 5.4.1:** *Organization implements a strategy to monitor for damaging agents and invasive species, prevent damage, and properly mitigate such damage.*

Guidance:

Emerald Ash Borer Network [Emerald Ash Borer Preparedness Plans](#)

Example: City of Portland (United-States): [Dutch Elm Disease Management](#)

- **Indicator 5.4.2:** *Organization establishes policies or procedures to mitigate damage from human activities.*

Guidance:

Arbor Day Foundation: Tree City Bulletins, [Let's Stop Salt Damage](#) and [A Systematic Approach to Building with Trees](#)

Tree Canada: [Tree Protection during Construction/Trees and Building Foundations](#)

International Society of Arboriculture Trees Are Good: [Why Topping Hurts Trees](#)

Example: City of Ottawa (Canada): [Tree Protection By-law](#)

## Objective 6: Special Sites, including Natural Areas

To manage lands that are geologically, culturally, economically, or *ecologically important* in a manner that considers their unique qualities.

- **Performance Measure 6.1:** *Organization establishes appropriate guidelines for the protection and conservation of special sites and natural areas.*
  - **Indicator 6.1.1:** *Organization establishes and maintains conservation and management objectives based on land and/or site evaluation.*

Guidance:

Example: City of Denver (United-States): [Parks & Recreation – Urban Ecology](#)

Example: City of Edmonton (Canada): [Natural Connections Integrated Conservation Plan](#)

Example: New York City Natural Areas Conservancy (United-States): [Forest Management Framework](#)

- **Performance Measure 6.2:** *Organization* identifies, evaluates, and maps *special sites*, natural areas, and/or natural area features within the urban or community forest.
  - **Indicator 6.2.1:** *Organization* uses a data-management system to identify, map, plan for, and manage natural areas and *special sites*.

Guidance:

*Organization* should consult appropriate professionals, resource managers, First Nations, and other *interested parties* to identify *special sites*, natural areas, and natural area features. *Special sites* and natural area features should be identified and mapped; these should include:

- Rare or threatened ecosystems.
- Watercourses and associated *riparian zones* that support *native species of aquatic species* have been identified and mapped.
- Known *sites* critical to life functions of *native/endemic* fauna including but not limited to important nesting areas (e.g. Heron Rookeries), dens (e.g. bears) or other special *habitat* areas.
- Known archaeological & cultural *sites* important to First Nations/*Indigenous* communities.
- Natural features that have been identified as historically significant, or identified for *protection* by way of regional or local ordinance/by-law, including but not limited to individual trees, stands of trees, artesian springs.
- Land areas that have the potential to serve as corridors/connections for movement of fauna between natural areas.
- Rare or unusual landforms created by geomorphological processes.

- **Performance Measure 6.3:** *Organization* employs strategies to effectively manage natural areas and *special sites* to protect, preserve, conserve, maintain, restore and/or enhance their natural function.

Guidance:

*Organization* should monitor performance against the guidelines for protection, preservation, and conservation.

*Organization* should consider issues such as:

- *Invasive species*
- Ecological connectivity (Example: Rouge National Urban Park (Canada): [Management Plan](#))
- Archaeological, historical, and *culturally important sites*
- Recreational access
- At risk species of flora and fauna
- *Native* and flora and fauna that is *endemic* to managed natural areas.

*Organization* should manage access (persons, vehicles, and dogs) to natural areas and *special sites* to assist in *protection* and preservation. Efforts may include:

- Physical barriers and signage
- Enforcement by on-site staff
- Posting of regulatory information via website, social media, print, or other electronic means.
- Example: City of Toronto (Canada): [Environmentally Significant Areas](#)

- **Indicator 6.3.1:** *Organization manages special sites and/or natural areas based on existing scientific research and best management practices.*

Guidance:

*Organization* should recognize that various geographic regions have distinct issues that require unique management *strategies* are in place to *protect* and preserve natural areas and *special sites* with respect to issues such as, but not limited to:

- Interface fires
- Geologically unstable areas
- Areas being damaged by *invasive species*

Example: City of Surrey (Canada): [Natural Areas Management Plan](#) and [Fire Management Strategy](#)

## Objective 7: Climate-Smart Management

To promote *climate change resilience* and address pressing environmental, social, and economic concerns using tree-related *adaptation* and *mitigation strategies*.

- **Performance Measure 7.1:** *Organization monitors and strives to maximize the ecosystem services provided by the urban or community forest, such as carbon sequestration, and storage, stormwater reduction, air quality, urban heat island, temperature, and others as appropriate.*

Guidance:

Vibrant Cities Lab: [Climate Health Action Guide](#)

Treasure Valley Canopy Network: [City Forest Credits](#)

Trees and Action Design Group (TDAG): First Steps in Air Quality for Built Environment Practitioners available on: [University of Birmingham ePapers Repository](#) and [The Canopy](#) Tree Benefits Policy Guide

- **Indicator 7.1.1:** *Organization quantifies and tracks ecosystem services, economic, and/or aesthetic benefits.*

Guidance:

My City's Trees: [Bringing the Nation's Forest Census to Urban Areas](#)

i-Tree: [Tree Canopy Assessment Tools](#)

- **Indicator 7.1.2:** *Organization* utilizes tree planning and management efforts to maximize *ecosystem* services.

Guidance:

Government of Canada: [Urban heat islands tools and resources](#)

Treasure Valley Canopy Network: [Shade Tree Project](#)

- **Indicator 7.1.3:** *Organization* incentivizes the use of trees and *green infrastructure* to *minimize* greenhouse gas emissions and stormwater runoff and flooding, while maximizing carbon sequestration.

Guidance:

Arbor Day Foundation: [Energy Saving Trees](#)

European Union: [The forms and functions of green infrastructure](#)

Example: City of San Antonio (United-States): [GreenShade Energy Saving Tree Rebate Program](#)

Example: Milwaukee Metropolitan Sewerage District (United-States): [Green Infrastructure Funding Programs](#)

- **Performance Measure 7.2:** *Organization* monitors and takes steps to *minimize* the carbon footprint of their *urban or community forestry* operations.

Guidance:

*Organization* could include a regular basic CO<sub>2</sub>/Green House Gasses (GHGs) assessment for *urban forestry* operations.

Example: City of Eugene [Community Climate and Energy Action Plan](#)

Green Municipal Fund – Federation of Canadian Municipalities: [Factsheet: Municipal Governance for Deep Decarbonization](#)

- **Indicator 7.2.1:** *Organization* demonstrates that *strategies* are utilized to minimize carbon footprints and maximize *urban wood* utilization to minimize the release of greenhouse gases into the atmosphere, and to help promote a circular economy.

Guidance:

US Forest Service: [Trees are Climate Change, Carbon Storage](#) Heroes

Arbor Day Foundation: [The Cycle of Urban Wood](#)

- **Performance Measure 7.3:** *Organization* regularly assesses and works to address vulnerabilities within their jurisdictions related to *climate change* and extreme weather.
  - **Indicator 7.3.1:** *Organization* implements strategies to mitigate the effects of urban heat islands, ecological disruption, and social/economic disruption due to *climate change*.

Guidance:

United States Environmental Protection Agency: [Reduce Urban Heat Island Effect](#)

United States Department of Agriculture (USDA) Forest Service: [The Heat is On: Using Tree Canopy to Cool Communities](#) and [Climate adaptation actions for urban forests and human health](#)

- **Indicator 7.3.2:** *Organization* promotes tree preservation and *planting* to maximize the provision of various *ecosystem services*, prioritizing areas with historically disadvantaged and vulnerable populations and low *tree equity*.

Guidance:

Food and Agriculture Organization of the United Nations (FAO): [Tree planting and ecosystem restoration: a crash course](#)

Government of Canada: [2 Billion Trees Commitment](#)

American Forests: [Tree Equity Score](#)

United States Government Council on Environmental Quality: [Climate and Economic Justice Screening Tool](#)

Example: City of Winnipeg (Canada): [Comprehensive Urban Forest Strategy](#)

## Objective 8: Urban and Community Forest Planning

To ensure the long-term sustainability of the urban and community forest resource and management program through comprehensive planning and strategic goal setting.

- **Performance Measure 8.1:** *Organization* engages in comprehensive and regular *urban or community forestry* system assessments and monitoring sufficient to allow it to generate informed *management plans* and management *strategies* based on current conditions of the forest.
  - **Indicator 8.1.1:** *Organization* has an urban or community forest resource assessment underway or has a current urban or community forest resource assessment.

### Guidance:

*Organization* should have at least one current forest resource assessment which should have a geographic component. Assessment types could include:

- urban tree canopy (example: i-Tree [Tree Canopy Assessment Tools](#) or Tree Canopy Assessment at Google Explorer [Environmental Insights](#)),
- *tree equity* assessments,
- tree inventories,
- community surveys,
- natural area assessments, and
- broad community *interested parties'* interviews.

Green Municipal Fund – Federation of Canadian Municipalities: [Factsheet: Urban forestry technology and tools](#)

### Examples of an Assessment:

City of Los Angeles, Bureau of Street Services: [Tree Inventory](#)

City of Surrey [Biodiversity Conservation Strategy](#)

- **Indicator 8.1.2:** *Organization* documents administrative and operational performance monitoring related to tree canopy extent, condition, and distribution; *ecosystem services*; operational costs and measurable results; and *urban or community forest* system vulnerabilities.

### Guidance:

City of Portland: [Portland Parks & Recreation Tree Canopy Monitoring](#)

US Forest Service: [Urban tree canopy assessment: a community's path to understanding and managing the urban forest](#)

Example: Town of Orangeville (Canada): [Street Tree Dashboard](#)

Example: City of Surrey (Canada): [Sustainability Dashboard](#)

- **Performance Measure 8.2:** *Organization* supports and elevates planning efforts by consulting relevant and interested community *interested parties*.

Guidance:

*Interested parties* could include:

- Community residents,
- Urban and community shade tree committees,
- Environmental committees, or similar *organizations*,
- Foresters,
- Municipal, state, provincial and/or federal agencies,
- Municipal or local groups,
- Utility service providers,
- Professional societies,
- Conservation *organizations*,
- *Indigenous Peoples* and governments,
- Community groups,
- Universities,
- Extension agencies,
- And other pertinent groups.

- **Indicator 8.2.1:** *Organization* seeks input from advisory groups, professional consultants, intra-agency departments, and other community *interested parties* to advise on the establishment, *conservation*, *protection*, and maintenance of urban and community trees and forests, to ensure inclusivity and collaboration.

Guidance:

Vibrant Cities Lab: [Build a Framework for Change](#)

- **Performance Measure 8.3:** *Organization* has comprehensive interdisciplinary planning *strategies* that are integrated with other departments and internal administrative groups and align with *interested parties'* interests and goals.

Guidance:

United Nations Economic Commission for Europe (UNECE): [Urban Nature Policy Toolkits](#)

Example: City of Saskatoon (Canada): [Urban Forest](#) see [Pathway to a Sustainable Urban Forest: Implementation Plan 2022-2031](#)

- **Indicator 8.3.1:** *Organization* has a clearly defined vision that, at the highest level, guides planning and management decisions.

Guidance:

Urban Forest Management Plan Toolkit: [Urban Forest Management Planning](#)

Green Municipal Fund – Federation of Canadian Municipalities: [Factsheet: Urban forest planning](#)



- **Indicator 8.3.2:** *Organization* has documented, publicly available *strategies* that support current goals and operational targets.

Guidance:

*Organization* should have a current *urban forest master plan*, a general assessment, and *policy* summary for the community's entire *urban forest*, with guidance from external partners and from departments that impact trees. The *master plan* provides consistency between policies and plans of different departments and partner groups. Plans should:

- Include an *urban forest maintenance plan* (or comparable set of documents).
- Identify and prioritize action items based on professional, relevant inventories and/or resource assessments.
- Include tree maintenance cycle information,
- Outline the future management of the *organization's* trees and forests,
- Be current and actively used within the past five years,
- Guide management decisions and/or resource allocation,
- Be updated as needed to incorporate new information,
- Include tree *planting*, canopy, or stocking level goals,
- Include *tree equity* goals,
- Include information and goals on budgets and staffing,
- Include directions for regular operations,
- Include proactive approaches for monitoring and evaluation of the *program* and the tree population,
- Consider and, where applicable, incorporate externally owned and managed trees in the community into management and planning efforts,
- Include *urban wood* utilization, *forest health*, *special sites*, natural areas, climate, and human health, as appropriate.

## **Objective 9: Management and Care of Urban and Community Forests and Trees**

To ensure that best *practices* are followed in the establishment, maintenance, and management of forests and trees.

- **Performance Measure 9.1:** *Organization* has management authority and one or more *qualified resource professionals* directing *urban or community forest* management and maintenance activities.

Guidance:

A municipal *organization* could participate in the Urban and Community Forestry Society's' [Accreditation Program](#) to show commitment to municipal *forestry* management.

Project Learning Tree Canada: [Urban Forester](#)

Ontario Professional Foresters Association (OPFA): [Urban Forestry](#)

- **Indicator 9.1.1:** *Organization* employs or has an agreement with a professional that has the education and expertise required to effectively lead and manage the *urban or community forestry program*.

**Guidance:**

Education can be documented through relevant *degrees* in *urban forestry, forestry, arboriculture*, or closely related fields. Expertise can be documented through professional credentialing *programs* such as International Society of Arboriculture’s certifications (i.e. ISA Certified Arborist, ISA Municipal Specialist) and qualifications (i.e. ISA Tree Risk Assessment Qualification), state certification or licensure, or other registered professional certification bodies.

- **Indicator 9.1.2:** *Organization* has formally adopted responsibility and authority for the *planning, management, protection, preservation, and care* of urban or community trees, forests, and the landscapes they populate through ordinances, charter, or other guiding *policies* or agreements.

**Guidance:**

Chicago Region Trees Initiative: [Tree Ordinances](#)

Example: City of Portland Oregon (United-States): [Urban Forest Management Plan](#)

Example: City of Vaughan (Canada): [Urban Forest Management Plan](#)

Example: City of Kelowna (Canada): [Sustainable Urban Forest Strategy](#)

- **Performance Measure 9.2:** *Organization* adopts and implements *urban or community forest policies, procedures, and standards*.

**Guidance:**

*Organization* could adopt development *policies* or other controlling provisions and written standards of practice or operating procedures that effectively *protect* trees during land disturbance and infrastructure maintenance activities. i.e., ordinances, formal site plan review process, permitting, mitigation, incentives, etc.

Example: City of Vancouver (Canada): [Vancouver's Urban Forest Strategy](#)

Example: City of Seattle (United-States): [Trees & Codes](#)

*Organization* could adopt current ISA “[Best Management Practices - Managing Trees During Construction](#).” Tree Protection examples could include:

- Standards for tree protection.
- Protective fencing.
- Alternative methods to trenching or excavation in critical root zones.
- Selective pruning of roots and branches before work begins.
- Mulching.
- Managing soil moisture, nutrient, and air exchange management.
- Watering.
- Post-development or post-construction restoration.

- **Indicator 9.2.1:** *Organization* has adopted *policies*, *planning strategies*, *ordinances*, and/or *best management practices* that govern the *planting*, *establishment*, *maintenance*, *protection*, *risk management*, and *removal* of trees.

Guidance:

Urban Tree Foundation: [Planting Details and Specifications](#)

National Tree Safety Group (UK): [Common sense risk management of trees: guidance 2nd edition](#)

Example: City of Charlottesville (United-States): [Best Management Practices for Tree Preservation, Transplanting, Removal and Replacement](#)

- **Indicator 9.2.2:** *Organization* regularly assesses and utilizes current and scalable urban or community tree health, canopy distribution, social and ecological vulnerability, and *ecosystem services* data to inform, formulate, and adopt *urban or community forest* policies, *planning goals*, *management strategies*, *maintenance standards*, and *program goals*.

Guidance:

US Climate Resilience Toolkit: [Urban Tree Canopy Assessment](#)

Nature Canada Tree Equity: [Canada's Urban Forests Bringing the Canopy to All](#)

- **Performance Measure 9.3:** *Organization* coordinates tree *planting* and *establishment*.
  - **Indicator 9.3.1:** *Organization* has an established *program* for *planting* and *establishing* site-appropriate trees on managed *public and/or private property*, including green stormwater infrastructure, in accordance with nationally or regionally adopted *best management practices*.

Guidance:

Government of Canada: [2 Billion Trees Commitment](#)

United States Environmental Protection Agency: [Stormwater Trees: Technical Memorandum](#)

Green Municipal Fund – Federation of Canadian Municipalities: [Factsheet: Tree planting process](#)

Example: City of Ottawa (Canada): [Tree planting](#)

Trees and Design Action Group (TDAG): [Guides to Inform Decision-making on Urban Trees](#)

- **Indicator 9.3.2:** *Organization* demonstrates appropriate post-planting follow-up care for all trees based on species, size, and type of stock, *site* characteristics, local climate, and maintenance needs.

Guidance:

Canopy: [Caring for Trees](#)

University of Nebraska- Lincoln Institute of Agriculture and Natural Resources: [Follow-Up Care for Newly Planted Trees](#)

- **Indicator 9.3.3:** *Organization* actively supports initiatives, policies, outreach, or public assistance strategies that encourage private landowners to replace trees that have died or been removed.

Guidance:

DC Department of Energy and Environment: [Front Door Tree Rebate Program](#)

DC Government Data Policy: [Tree Permitting](#)

Example: City of Kirkland (Canada): [Tree Planting Incentive Programs](#)

- **Indicator 9.3.4:** *Organization* demonstrates that the five-year rolling average of trees planted within managed areas is equal to or greater than the number of trees removed, for all reasons, in the absence of a catastrophic disaster.

Guidance:

*Organization* should strive to, at least, replace every tree that dies or is removed to reduce tree canopy loss.

- **Performance Measure 9.4:** *Organization* maintains managed forests and trees under its jurisdiction.
  - **Indicator 9.4.1:** *Organization* has an established *program* of care for young trees that is aligned with nationally or regionally adopted *best management practices*.

Guidance:

Arbor Day Foundation: [Tree Life Stages](#)

Space for Life Montreal: [The Green Pages: Planting trees and shrubs: Before, during and after](#)

PennState Extension: [Making Sure Your Young Shade Trees Survive](#)

Canopy: [Caring for Young Trees](#)

- **Indicator 9.4.2:** *Organization* implements proactive resource management, monitoring, and maintenance *strategies* for established trees that optimize tree health and longevity, public safety, and resource allocations.

Guidance:

Vibrant Cities Lab: [Monitoring & Maintaining Your Urban Forest](#)

Green Municipal Fund – Federation of Canadian Municipalities: [Factsheet: Tree maintenance](#)

- **Indicator 9.4.3:** *Organization* annually conducts systematic visual assessments of 15% or more of the managed tree population for *forest health*, structural defects, and risk management, and prescribes and performs proactive pruning and restorative maintenance as needed to sustain a safe and healthy *urban or community forest* that coexists with the built environment.

Guidance:

*Organization* should inspect each tree on a 6 to 7 year cycle and perform necessary maintenance.

Tree Canada: [Tree Inspection Cycle](#)

Tree Canada: [Pruning Practices](#)

- **Performance Measure 9.5:** *Organization* preserves and *protects* forests and trees.
  - **Indicator 9.5.1:** *Organization* exercises the authority and has the capacity to implement and enforce tree *protection* codes, policies, standards, and/or construction specifications.

Guidance:

*Organization* should exercise the authority and capacity to implement and enforce tree *protection* codes, policies, standards, and construction specifications through site plan reviews, on-site inspections, and monitoring and administrative actions.

Administrative actions could include:

- Stop work orders.
- Citations.
- Permit revocation.
- Withholding of occupancy permit.
- Redemption of performance bonds.
- *Mitigation* orders.
- Judicial process.

- **Indicator 9.5.2:** *Organization* demonstrates inclusive community engagement, equitable protocols, and targeted programming to ensure that forests and trees are preserved and protected in all neighborhoods regardless of social, ethnic, or economic demographics.

Guidance:

Community Involvement with Urban Forestry: [Trees for Energy Conservation](#)

## Objective 10: Disaster Readiness, Response, and Recovery

To limit undesirable effects and aid in the recovery of communities and forest resources from disasters through strategic planning, preparation, effective response, restoration, and improved *resilience*.

- **Performance Measure 10.1:** *Organization* proactively plans and prepares for catastrophic natural events and disasters that can reasonably be anticipated.

### Guidance:

*Organization* should implement appropriate prevention and *mitigation programs* and *strategies* to reduce risks prior to an event, including appropriate funding sources, operational capacity, mutual aid agreements, and standing contracts or agreements in place with private contractors for surge capacity.

*Organization* should adopt standards and procedures prior to an event to ensure ability to enforce standards during response and recovery activities. *Organization* should consider the likelihood of an event or disaster during the planning process. Events and disasters could include:

- Extreme weather such as storms, ice, snow, wind, hurricanes, tornadoes, heat, drought, and flooding.
- Wildfire.
- Invasive pests.
- War or other conflict

- **Indicator 10.1.1:** *Organization* assesses risks and develops and documents equitable disaster response *strategies*, including debris management, appropriate for events in its region.

### Guidance:

Texas A&M Forest Service: [Growing Texas Community Planning Guide: Storms](#)

United States Environmental Protection Agency: [Disaster Debris Planning](#)

North Carolina Urban Forest Council: [NC Trees & Storms – Information and Guidelines for Communities, Professionals, and Residents](#)

- **Indicator 10.1.2:** *Organization* implements appropriate prevention and *mitigation programs* and *strategies* to reduce risks prior to an event.

### Guidance:

Government of Canada: [Disaster prevention and mitigation](#)

ISA Texas: [Texas Wildfire Risk Reduction Qualification](#)

Green Infrastructure Center: [Storm Mitigation Planning](#)

- **Performance Measure 10.2:** *Organization* implements adopted disaster-response *strategies* in response to events.
  - **Indicator 10.2.1:** *Organization* activates appropriate response teams, integrates with other emergency management operations, and follows governmental emergency-management guidelines or *programs* where appropriate.

Guidance:

*Organization* could work with groups such as [state urban forestry programs](#) or the [Urban Forest Strike Teams](#).

Vibrant Cities: [Emergency Operations Planning Guide for Storm Response](#)

Tree Canada: [Emergency Preparedness](#)

- **Indicator 10.2.2:** *Organization* maximizes opportunities to preserve damaged trees and divert woody debris for highest and best uses.

Guidance:

Government of British Columbia: [Wildlife Tree & Course Woody Debris Guidance & Policies](#)

Global Earth Repair Foundation: [Some Uses of Woody Biomass in Gardening and Regenerative Agriculture](#)

Example: Nashville Tree Conservation Corps [What to Do With Tree Debris After Spring Winds and Storms](#)

- **Performance Measure 10.3:** *Organization* implements recovery *strategies* after an event.

Guidance:

*Organization* could work with other *organizations* and *programs* such as: Arbor Day Foundation's [Community Tree Recovery](#).

Keep America Beautiful's [Retreat program](#).

Tree Canada's [Operation Relief](#)

- **Indicator 10.3.1:** *Organization* has and implements a risk *mitigation program* to reduce residual risk following events.

Guidance:

Colorado State Forest Service: [Forest Restoration & Wildfire Risk Mitigation](#)

US Forest Service: [Community Forest Storm Mitigation Planning – Storm Recovery](#)

- **Indicator 10.3.2:** *Organization* implements effective restoration, maintenance, and replanting *strategies* following events.

Guidance:

US Forest Service Department of Agriculture: [Reforestation](#)

One Tree Planted: [Reforestation](#)

- **Indicator 10.3.3:** *Organization* assesses the impact of events and evaluates the effectiveness of their readiness, response, and recovery efforts.

Guidance:

*Organization* could utilize urban tree canopy data to track changes following events to evaluate recovery efforts.

### **Objective 11: Capacity-Building**

To promote continued improvement in the *practice* of sustainable management through education, outreach, sufficient resourcing and funding, professional development, engagement, stewardship, and performance review.

- **Performance Measure 11.1:** Organization ensures budgets are in place for *urban or community forestry* operations.
  - **Indicator 11.1.1:** *Organization* has a dedicated budget for *urban or community forestry* related activities.

Guidance:

Vibrant Cities Lab: [Funding](#)

Arbor Day Foundation: [Tree City USA Expense Sheets](#)

- **Indicator 11.1.2:** *Organization* assesses current and future budgeting needs based on *strategies*, plans, and desired future conditions and/or goals.

Guidance:

Pennsylvania State University: [Sustaining and Funding an Urban Forestry Program](#)



- **Performance Measure 11.2:** *Organization actively engages interested parties.*

Guidance:

US National Urban and Community Forestry Advisory Committee’s Ten-Year Urban Forestry Action Plan [Stakeholders and Audience](#)

*Organization* should work with [ISA Chapters](#) and [SFI Implementation Committees](#) where available and appropriate to achieve on-the-ground progress.

Tree Canada: [Canadian Urban Forest Network](#)

- **Indicator 11.2.1:** *Organization produces an annual report of engagement with decision makers, leaders, citizens, and other interdepartmental staff based on outreach and engagement plans.*

Guidance:

Sustainable Urban Forest Coalition: [Scan of Outreach Efforts](#)

Example: City of Austin (United-States): [Urban Forestry Program](#)

Example: City of Vancouver (United States): [Urban Forestry](#) see [Urban Forestry Annual Report](#)

- **Indicator 11.2.2:** *Organization works with volunteers and tracks the number of hours worked, if applicable.*

Guidance:

Up With Trees: [Volunteers](#)

- **Performance Measure 11.3:** *Organization utilizes performance reviews to improve its program.*

- **Indicator 11.3.1:** *Organization employs a regular review process to assess the implementation of relevant strategies, with action steps identified to achieve desired future conditions and/or goals.*

Guidance:

*Organization* should implement adaptive management to improve operations.

Urban Forest Management Plan Toolkit: [Adaptive Management](#)

- **Indicator 11.3.2:** *Organization identifies staff and/or organizations for various ancillary functions such as: outreach, volunteer management, planting, tree care management, inter-department communication, etc.*

- **Performance Measure 11.4:** *Organization* supports professional development and improvement.
  - **Indicator 11.4.1:** *Organization* has trained and credentialed managers, crews, or contractors.

Guidance:

International Society of Arboriculture: [Credentials](#)

Tree Care Industry Association: [Hiring a Tree Care Company](#)

Association of BC Forest Professionals: [Urban Forestry FAQs](#)

- **Indicator 11.4.2:** *Organization* provides opportunities for continuing educational development.

Guidance:

Canadian Institute of Forestry: [Continuing Forestry Education Credits](#)

Tree Care Industry Association: [TCIA Education](#)

Tree Fund: [Webinars](#)

Tree Canada: [Canadian Urban Forest Network E-Lectures](#)

Urban Forestry Today: [Publications and Webcast Archives](#)

## Objective 12: Urban Wood and Community Forest Utilization

To ensure the highest and best use of *urban and community forest wood* resources and *minimize* waste from our urban and *community forests*.

- **Performance Measure 12.1:** *Organization* has a *strategy* stating that living trees are the highest and best use until the risk exceeds tolerance or the tree has reached the end of its useful living, standing life, and then defines what to do when trees or parts of trees are removed and supports their best utilization in compliance with controlling regulations.

### Guidance:

*Organization* could utilize an evaluation process to assess past performance and establish future goals for *urban wood* utilization.

*Organization* should:

- Use locally appropriate metrics to determine what and how material was recovered that would have been wasted otherwise.
- Develop targets for the next year that strive to meet or exceed previous year's results.
- Document estimated economics of reduced costs or increased revenues to support local *programs*.
- Document local *urban wood* being purchased and or utilized by the *organization* in new construction, building or furnishings, showing an increasing percentage used each year.

*Organization* could adopt and utilize the [USRW Certified Wood Standards](#) to assist with their *urban wood* utilization program.

Baltimore City [Baltimore Wood Project](#)

Example of a controlling regulation:

Government of Canada: [Emerald Ash Borer Regulated Areas and Items](#)

Don't Move Firewood.com: [Firewood Map](#)

- **Indicator 12.1.1:** *Organization* includes *urban wood or community forest* utilization targets including criteria used to determine the best use for various wood products based upon size, quality, circumstances, and available local resources.

### Guidance:

Best use could include:

- Leave for *wildlife habitat* with strategic placement to promote *biodiversity* and *forest health*.
- Mill into lumber or other wood products.
- Leave in *public spaces* for natural aesthetics, recreation, *conservation* education, or landscaping.
- Convert to various biomass products such as biochar, biofuel, or mulch.

- **Performance Measure 12.2:** *Organization* values and manages trees as full-cycle resources that are utilized even after removal to support environmental, economic, and social values, while understanding that the highest and best use will vary due to region and circumstance.

Guidance:

*Organization* should consider *urban wood* utilization during tree replacement and *planting* operations to include the eventual best, full-cycle use of the tree once it must be removed.

Urban and Community Forestry Society: [Trees First. Wood Next – Realizing the Highest and Best Use for the Products of Urban Forests](#)

Example: Sacramento Tree Foundation: [Urban Wood Rescue](#)

Example: LEAF Toronto: [Urban Wood Utilization](#)

- **Indicator 12.2.1:** *Organization* supports local utilization of wood through investments, purchases, or supplying materials.

Guidance:

Cambium Carbon: [Carbon Smart Wood](#)

Government of Ontario: [Provincial Wood Supply Strategy](#)

- **Indicator 12.2.2:** *Organization* facilitates ongoing training and employs practices that ensure trees are removed in a manner that supports the highest use and value.

Guidance:

Trees Virginia: [Virginia Urban Wood Group Instructional Videos](#)

Conservation Corps of Long Beach: [Urban Wood: A Passageway to a Meaningful Career Project](#)

- **Performance Measure 12.3:** *Organization* engages *interested parties* and *urban wood* or community forest professionals in support of a self-sustaining network to build long-term capacity.

Guidance:

*Organization* facilitates community engagement with *urban wood* utilization.

Vibrant Cities Lab: [Urban Wood Reuse](#)

Urban Wood Network: [The Urban Wood Toolkit](#)

Urban Tree Alliance: [Urban Wood Utilization](#)

- **Indicator 12.3.1:** *Organization* participates in urban wood or community forest utilization arrangements and/or membership or participation in urban wood-use or community forest *organizations*.

**Guidance:**

*Urban wood* professionals include arborists, tree care companies, wood processors, and manufacturers who follow best industry standards and *practices*.

*Organization* could support local workforce development and vocational training opportunities in wood utilization.

- **Indicator 12.3.2:** *Organization* supports industry approved standards and/or chain-of-custody procedures or *policies*.

**Guidance:**

*Organization* could follow the USRW Urban Wood Standards: [Urban Salvaged and Reclaimed Woods Inc.](#)

*Organization* could follow the [SFI 2022 Chain of Custody Standard](#)

### Objective 13: Communications

To invest in and utilize effective communications both internally and externally to support and promote all aspects of the *urban and community forest* and urban and community forestry *program*.

- **Performance Measure 13.1:** *Organization* has a communication *strategy* that includes outreach, engagement, and education about *urban or community forests* and trees, the associated values and benefits, and the need for management and care.

**Guidance:**

Tree Canada Canadian Urban Forest Strategy- Communications and Public Education: [Canadian Urban Forest Strategy – Tree Canada](#)

*Organization* could collaborate with [SFI Implementation Committees](#) or [International Society of Arboriculture chapters, professional affiliates, or associate organizations](#) for outreach, engagement, and education.

Example: City of Seattle: [Urban Forestry Communication Toolkit](#)

Green Infrastructure Ontario Coalition: [Communication the Benefits of the Urban Forest in a Municipal Context](#)

- **Indicator 13.1.1:** *Organization* prioritizes two-way and diverse communication.

**Guidance:**

Tree Canada Considering Diverse, Social Inclusion, and Equity through Urban Forest Collaborations [Considering Diversity, Social Inclusion, and Equity through Urban Forest Collaborations – Tree Canada](#)

- **Indicator 13.1.2:** *Organization* utilizes multiple methods of shareable and accessible information about the *urban or community forest*, communicating about policies and who is responsible for them, with contact information.

Guidance:

Cities 4 Forests: [Urban Forests for Healthier Cities Learning Guide](#)

- **Indicator 13.1.3:** *Organization* annually evaluates the effectiveness of communication efforts and adjusts as needed.

Guidance:

*Organization* could follow a procedure like the City of Austin, Texas . [Urban Forestry Public Engagement Process Report](#)

Example: City of Vancouver (United States): [Urban Forestry](#) see [Urban Forestry Annual Report](#)

- **Performance Measure 13.2:** *Organization* invests in *urban or community forest* and tree-related communication efforts.

Guidance:

*Organization* could document the resources utilized to communicate about the *urban forest* and trees inside and outside of the *organization*.

- **Indicator 13.2.1:** *Organization* implements a communication *strategy* and shares its accomplishments internally and externally.

Guidance:

Missouri Department of Conservation: [Trees Work Campaign](#)

## Objective 14: Research, Science, and Technology

To invest in, utilize, and promote research, science, and technology that supports sustainable resource management.

- **Performance Measure 14.1:** *Organization* has a *strategy* for staying informed about new research.
  - **Indicator 14.1.1:** *Organization* makes support available for *urban and community forestry* and *urban and community wood* practitioners to sustain membership in or receive training from professional *organizations*.

Guidance:

Urban and Community Forestry Society: [Membership](#)

International Society of Arboriculture: [Membership](#)

Ontario Professional Foresters Association: [Urban Forestry](#)

- **Indicator 14.1.2:** *Organization* participates in groups or *organizations* that increase access to research.

Guidance:

*Organization* should participate in local or regional climate task forces, Tree City USA and affiliated programs, Sustainable Urban Forest Coalition, university-based Extension, state or local *urban forestry programs*, or similarly aligned groups.

- USDA Forest Service: [National Urban and Community Forestry Advisory Council](#)
- Tree Research and Education Endowment ([TREE](#)) Fund
- Canadian Tree Research and Education Endowment ([TREE](#)) Fund

*Organization* could work with *SFI Implementation Committees* where available and appropriate to achieve on-the-ground progress. <https://forests.org/sic/>

- **Performance Measure 14.2:** *Organization* participates and/or invests in research that advances *urban and community forestry practices* locally and/or at a larger scale.
  - **Indicator 14.2.1:** *Organization* commits resources to collaborate with *interested parties* and partners to advance social science or applied *urban and community forestry* research when opportunities arise.

Guidance:

Activities could include:

- Identifying relevant issues.
- Facilitating data collection.
- Sharing existing data.
- Surveying interested parties.
- Providing access to study sites.
- Applying for or providing research funding.

- **Indicator 14.2.2:** *Organization* demonstrates willingness to participate in research that advances knowledge of *urban and community forestry* when opportunities arise, including contributing to projects and/or sharing findings within peer networks.

Guidance:

*Organization* could have a mechanism in place to identify and inform *urban forestry* and urban wood utilization needs that can be addressed via social science or applied research efforts.

*Organization* could have a mechanism to identify and apply documented, applicable findings of social science or applied research in community engagement.

*Organization* could contribute tree inventory data to research projects.

Example: Canadian Institute of Forestry: [Open Urban Forest Project](#)

- **Performance Measure 14.3:** *Organization* demonstrates commitment to applying findings from relevant research to the professional, sustainable management of the *urban or community forest*.

Guidance:

*Organization* is involved in activities that promote the dissemination of research. Activities could include:

- sharing via popular press,
- social media,
- peer networks,
- communities of *practice*,
- and lead or co-authorship of manuscripts.

- **Indicator 14.3.1:** *Organization* applies relevant current research in management strategies.

Guidance:

*Organization* could list research references in management plans or strategies.

Example: Kirkland Washington. [City of Kirkland Washington](#)

USDA Forest Service National Urban and Community Forestry: [Ten-Year Urban Forest Action Plan](#)

Vibrant Cities Lab: [See How Trees Improve . . .](#)

- **Performance Measure 14.4:** *Organization* acquires and utilizes technology that supports sustainable resource management.

Guidance:

Green Municipal Fund – Federation of Canadian Municipalities: [Factsheet: Urban Forestry Technology and Tools](#)

Canadian Geospatial and Open Data Research Partnership Open Data and Urban Forests- What's Next? [Open Data and Urban Forests – What's Next? | Geothink](#)

- **Indicator 14.4.1:** *Organization* invests in staff training for applications of technology used in sustainable resource management.

Guidance:

*Organization* could support in-person or asynchronous training in tools like [iTree Tools](#).



- **Indicator 14.4.2:** *Organization* is transparent regarding data collected via technology.

**Guidance:**

*Organization* could host an online dashboard for their tree inventory like Westerville, Ohio [Westerville Transparency Hub](#)

- **Indicator 14.4.3:** *Organization* utilizes technology and related data to promote equitable access to *urban and community forests* within jurisdiction of *organization*.

**Guidance:**

*Organization* could use Tree Equity Score tool from American Forest to facilitate equitable access to tree, forests, and their associated benefits like the [City of Detroit Michigan](#).

### **Objective 15: Legal and Regulatory Compliance including Recognizing Indigenous Peoples' Rights**

To comply with applicable laws and regulations and recognize *Indigenous Peoples' Rights*.

- **Performance Measure 15.1:** *Organization* complies with applicable *urban or community forestry* and related social and environmental laws and regulations.

**Guidance:**

Government of Canada: [Canada's Forest Laws](#)

United States Department of Agriculture Forest Service: [Urban Forests](#)

- **Indicator 15.1.1:** *Organization* has access to relevant laws and regulations in appropriate locations.
- **Indicator 15.1.2:** *Organization* has a system for achieving compliance with applicable laws and regulations.
- **Indicator 15.1.3:** *Organization* demonstrates a commitment to legal compliance through *available regulatory action information*.
- **Performance Measure 15.2:** *Organization* complies with all applicable social laws in the country in which the *organization* operates.

**Guidance:**

The Canadian Encyclopedia [Social Laws and Programs](#)

- **Indicator 15.2.1:** *Organization* has written *policy* demonstrating commitment to comply with social laws, such as those covering civil rights, equal employment opportunities, gender equality, *diversity*, inclusion, anti-discrimination and anti-harassment measures, workers' compensation, *Indigenous rights*, workers' and communities' right to know, prevailing wages, workers' right to organize, and occupational health and safety.

- **Indicator 15.2.2:** *Organization* respects the rights of workers and labor representatives in a manner that encompasses the intent of the International Labor Organization fundamental conventions.

**Guidance:**

[International Labour Organization](#)

- **Performance Measure 15.3:** *Organization* shall recognize and respect *Indigenous Peoples' rights*.

**Guidance:**

*Organization* can consult Objective 8: Recognize and Respect Indigenous People's Rights in the [Guidance to SFI 2022 Standards and Rules Section 7](#)

The United Nations: [United Nations Declaration of the Rights of Indigenous Peoples](#)

- **Indicator 15.3.1:** *Organizations* shall develop and implement a written policy acknowledging a commitment to recognize and respect the rights of *Indigenous Peoples*. This policy shall provide reference to a program that includes:
  - use of available resources and information to identify the *Indigenous Peoples* whose rights may be affected by the *Organization's* urban or community forest management activities.
  - recognition of the established framework of legal, customary, and traditional rights such as outlined in:
    - i. the UN Declaration on the Rights of *Indigenous Peoples*;
    - ii. federal, provincial, and state laws and regulations;
    - iii. treaties, agreements or other constructive arrangements among governments and *Indigenous Peoples*.
  - appropriate training of personnel and contractors so that the *Organization* is competent to fulfill their responsibilities under Objective 15 of the *SFI Urban and Community Forest Sustainability Standard*.
- **Indicator 15.3.2:** The written policy shall be publicly available.

## Objective 16: Reporting

To annually report progress on conformance with the *SFI* Urban and Community Forest Sustainability Standard to increase transparency.

### Guidance:

This objective applies to *organizations* that are certified to the *SFI* Urban and Community Forest Sustainability Standard.

- **Performance Measure 16.1:** *Organization* reports annually to *SFI* on its conformance with the *SFI* Urban and Community Forest Sustainability Standard.
  - **Indicator 16.1.1:** *Organization* provides prompt responses to the *SFI* annual progress report survey.
  - **Indicator 16.1.2:** *Organization* keeps records for all the categories of information needed for *SFI* annual progress report surveys.

### Guidance:

*Organization* should retain records according to appropriate local, regional, and national rules and regulations.

Sustainable Forestry Initiative [Audits and Reports](#)

- **Indicator 16.1.3:** *Organization* maintains copies of past survey reports to document progress and improvements that demonstrate conformance to the *SFI* Urban and Community Forest Sustainability Standard.
- **Performance Measure 16.2:** *Organization* provides a summary audit report, prepared by the *certification body*, to *SFI* after the successful completion of a certification, recertification, or surveillance audit to the *SFI* Urban and Community Forest Sustainability Standard.
  - **Indicator 16.2.1:** The summary audit report submitted by the *organization* (one copy must be in English), shall include, at a minimum:
    - The name of the *Organization* that was audited, including its *SFI* representative.
    - A general description of the *Organization's* urban forest included in the audit.
    - The name of the *certification body* and *lead auditor* (names of the *audit team* members, including *technical experts*, may be included at the discretion of the *audit team* and *organization*).
    - A description of the audit process, *objectives*, and scope.
    - The dates the audit was conducted and completed.
    - A description of substitute *indicators*, if any, used in the audit and a rationale for each.

- **Indicator 16.2.1:** Continued from page 43:
  - A summary of the findings, including general descriptions of evidence of conformity and any nonconformities and corrective action plans to address them, opportunities for improvement, and exceptional *practices*.
  - The certification decision.

The summary audit report will be posted on the *SFI* website (<https://forests.org/>) for public review.

## Definitions

adaptation:	Climate change adaptation refers to actions that reduce the negative impact of climate change, while taking advantage of potential new opportunities. It involves adjusting policies and actions because of observed or expected changes in climate.
aquatic habitat:	An area where water is the principal medium that provides the resources and environmental conditions to support occupancy, survival, and reproduction by individuals of a given species
aquatic species:	Animals that live on or within water during some stage of their development.
audit team:	One or more auditors conducting an audit, supported if needed by technical experts (ISO 19011:2018).
auditor:	A person with the competence needed to conduct an audit (ISO 19011:2018).
available regulatory action information	Statistics or regulatory compliance data collected by a federal, state, provincial, or local government agency. Note: Although conformance with laws is the intent, certification bodies are directed to look for a spirit and general record of compliance rather than isolated or unusual instances of deviation.
best management practices (BMPs):	A practice or combination of practices for protection of water quality that is determined by a federal, provincial, state, or local government or other responsible entity, after problem assessment, examination of alternative practices, and appropriate public participation, to be the most effective and practicable means (including technological, economic, and institutional considerations) of conducting a forest management operation while addressing any environmental considerations.
best scientific information:	Available factual information that is generally accepted by the broad scientific community. It includes but is not limited to peer-reviewed scientific information obtainable from any source, including government and non-governmental sources, that have been verified by field testing to the maximum extent feasible.
biodiversity:	The variety and abundance of life forms, processes, functions, and structures of plants, animals, and other living organisms, including the relative complexity of species, communities, gene pools, and ecosystems at spatial scales that range from local to regional to global.
biological diversity:	The variety and abundance of life forms, processes, functions, and structures of plants, animals, and other living organisms, including the relative complexity of species, communities, gene pools, and ecosystems at spatial scales that range from local to regional to global.
built environment	<u>Human-made</u> structures, features, and facilities viewed <u>collectively</u> as an environment in which people live and work.

certification body:	An independent third party that is accredited by: <ul style="list-style-type: none"> <li>• ANSI-ASQ National Accreditation Board (ANAB) as being competent to conduct certifications to the 2022 Forest Management Standard, SFI Fiber Sourcing Standard, SFI Chain-of-Custody Standard or SFI Certified Sourcing Standard, SFI Small Lands Group Certification Module, or SFI Small Scale Forest Management Module for Indigenous Peoples and Families.</li> <li>• Standards Council of Canada (SCC) as being competent to conduct certifications to the SFI 2022 Forest Management Standard, SFI Fiber Sourcing Standard, SFI Chain-of-Custody Standard or SFI Certified Sourcing Standard, SFI Small Lands Group Certification Module, or SFI Small Scale Forest Management Module for Indigenous Peoples and Families</li> </ul>
climate change:	A change in the state of the climate that can be identified (e.g., by using statistical tests) by changes in the mean and/or the variability of its properties and that persists for an extended period, typically decades or longer. Climate change may be due to natural internal processes or external forcings, or to persistent anthropogenic changes in the composition of the atmosphere or in land use. Note: Taken from the Intergovernmental Panel on Climate Change (IPPC).
community forest:	Term used in the USA for smaller communities that don't consider themselves 'Urban'; see urban forest. Note that “community forest” is often used in connection with community-based forestry, which is described as a participatory approach to forest management in which people in cities and towns manage areas of forest for a range of ecological, social, and economic values. For more information, see the Trust for Public Lands' report, “ <a href="#">Community Forests: A Path to prosperity and connection</a> ,” and the US Forest Service’s <a href="#">Community Forest and Open Space Conservation Program</a> . From the Canadian perspective, a community forest is “a tree-dominated ecosystem managed for multiple community values and benefits by the community. While this includes urban situations, most conceptions of community forests in Canada involve smaller rural communities and their forest hinterlands” (Duinker et. al. 1995)
conservation:	1. Protection of plant and animal habitat. 2. The management of a renewable natural resource with the objective of sustaining its productivity in perpetuity while providing for human use compatible with sustainability of the resource.
critically imperiled:	A plant or animal or community, often referred to as G1, that is globally extremely rare or, because of some factor(s), especially vulnerable to extinction. Typically, five or fewer occurrences or populations remain, or very few individuals (<1,000), acres (<2,000 acres or 809 hectares), or linear miles (<10 miles or 16 kilometers) exist. (Further information can be found under Forests with Exceptional Conservation Value in Section 7 — Guidance to SFI 2022 Standards and Rules.)
culturally important:	Having significance for or being representative of human activities or beliefs (e.g., documented areas such as cemeteries, sacred sites).
damaging agent	Any factor that negatively affects tree vitality and environmental and economic tree value is known as a damaging agent (Wulff, 2011)
degree:	A professional academic degree (e.g., bachelor’s) or equivalent.
diversity:	1. Diversity refers to individual and group/social differences. These include, but are not limited to, psychological, physical, and social differences that occur among any and all individuals, such as race, ethnicity, nationality, religion, economic class, age, gender, sexual orientation, and mental and physical ability. 2. The variety and abundance of life forms, processes, functions, and structures of plants, animals, and other living organisms, including the relative complexity of species, communities, gene pools, and ecosystems at spatial scales that range from local to regional to global.
diverse communities:	A diverse group, community, or organization is one in which a variety of social and cultural characteristics exist.

ecologically important:	Ecologically important can be defined as applying to natural communities, biological, ecological, or physical features which, either by themselves or in a network, contribute significantly to an ecosystem’s productivity, biodiversity, and resilience. Ecologically important areas may be so identified by the inclusion viable occurrences of species or natural communities that are integral to the identity or function of an ecosystem, but which may be relatively uncommon, including species or ecological communities with a high “S-Rank” or “G-Rank” from NatureServe, subject to the discretion of the Certified Organization.
ecosystem services:	Components of nature, directly enjoyed, consumed, or used to yield human well-being.
endemic:	Native or indigenous to a region.
exotic tree species:	A tree species introduced from outside its natural range. This does not include species that have become naturalized in an area and have a naturally reproducing population. Note: Hybrids of native species or native plants that have been derived from genetic tree improvement and biotechnology programs are not considered exotic species.
forest health:	The perceived condition of a forest derived from concerns about such factors as its age, structure, composition, function, vigor, presence of unusual levels of insects or disease, and resilience to disturbance.
forest inventory:	1. A set of objective sampling methods that quantify the spatial distribution, composition, and rates of change of forest parameters within specified levels of precision for management purposes. 2. The listing of data from such a survey.
forestry:	The profession encompassing the science, art, and practice of creating, managing, using, and conserving forests and associated resources for human benefit and in a sustainable manner to meet desired goals, needs, and values.
Forests with Exceptional Conservation Value:	Critically imperiled (G1) and imperiled (G2) species and ecological communities.
geographic information system (GIS):	An organized collection of computer systems, personnel, knowledge, and procedures designed to capture, store, update, manipulate, analyze, report, and display forms of geographically referenced information and descriptive information.
green infrastructure:	Living plants and natural materials within developed areas. Can be incorporated with gray infrastructure (utilities, paved surfaces, and buildings) to perform stormwater management, erosion control, temperature buffering, and other important ecological functions.
habitat:	1. A unit area of environment. 2. The place, natural or otherwise (including climate, food, cover and water), where an individual or population of animals or plants naturally or normally lives and develops.
human damage:	Injuries to trees and forests caused by human activity such as soil compaction, lawn mower or string trimmer impact to trunks, or improper pruning.
imperiled:	A plant or animal or community, often referred to as G2, that is globally rare or, because of some factor(s), is very vulnerable to extinction or elimination. Typically, six to 20 occurrences, or few remaining individuals (1,000 to 3,000), or acres (2,000 to 10,000 acres or 809 to 4,047 hectares), or linear miles (10 to 50 miles or 16 to 80.5 kilometers) exist. Additional information can be found under Forests with Exceptional Conservation Value in Section 7 of the SFI 2022 Standards and Rules.
indicator:	A specific metric that provides information about an organization’s forestry and environmental performance, and that is integral to assessing conformance to the SFI 2022 Standards’ objectives and performance measures.

Indigenous or Indigenous Peoples:	Inclusive of all Indigenous Peoples residing in Canada and the United States. More specifically, Indigenous Peoples are defined in the United States as members of federally recognized tribes and in Canada as those peoples that are recognized by section 35(2) of the Constitution Act, 1982. In the United States, the US Department of Interior's Bureau of Indian Affairs publishes a list of each of the 573 federally recognized tribes. In Canada, Indigenous and Northern Affairs Canada provides a list of the 619 recognized First Nations by province. Rights-holding Métis communities in Canada, as per S. 35(2) of the Constitution Act, 1982, include but are not limited to governing members of the Métis National Council as well as the Métis Settlements General Council.
Indigenous Peoples' rights:	Indigenous rights (sometimes referred to as Aboriginal rights) refer to practices, traditions, and customs that distinguish the unique culture of each First Nation and were practiced prior to European contact. These are rights that some Indigenous peoples of Canada hold as a result of their ancestors' longstanding use and occupancy of the land. The rights of certain peoples to hunt, trap, and fish on ancestral lands are examples of Indigenous rights. Indigenous rights vary from group to group, depending on the customs, practices, and traditions that have formed part of their distinctive cultures. Indigenous rights are protected under s.35 of the Constitution Act, 1982.
integrated pest management:	The careful consideration of all available pest control techniques and subsequent integration of appropriate measures that discourage the development of pest populations and keep pesticides and other interventions to levels that are economically justified and reduce or minimize risks to human health and the environment (source: FAO 2018).
integrated plant management:	A comprehensive program to manage the health, structure, and appearance of plants in the landscape, similar to integrated pest management. See also plant health care.
interested parties	A person, group, community, or organization with a vested interest in the subject of the standard. alternative term for stakeholders.
invasive:	Species introduced from another country or geographic region outside its natural range that may have fewer natural population controls in the new environment, becoming a pest or nuisance species.
invasive species:	Species introduced from another country or geographic region outside its natural range that may have fewer natural population controls in the new environment, becoming a pest or nuisance species.
land classification:	The process of designating areas of land into classes or strata that are sufficiently homogeneous in their physical, vegetative, and development attributes.
landscape:	1. A spatial mosaic of multiple ecosystems, landforms, and plant communities across a defined area, irrespective of ownership or other artificial boundaries and repeated in similar form throughout. 2. An area of land characterized by: a) similar biogeoclimatic conditions that influence site potential; b) similar historical disturbance regimes that influence vegetation structure and species composition; and c) sufficient size to provide the range of habitat conditions for naturally occurring communities (except for a few megafauna with large spatial needs, e.g., wolves).
lead auditor:	An auditor appointed to lead an audit team. Also referred to as an audit team leader (ISO 19011:2018, 3.14, note 1).
least-toxic and narrowest-spectrum pesticide:	A chemical preparation used to control site-specific pests that minimizes impact to non-target organisms while meeting management objectives. The management objectives should consider the target pest, the degree of control needed, and other issues, such as season and timing of application, rates and methods; and terrain, forest conditions, and the presence or absence of water bodies that may be impacted.

maintenance plan:	Short term (generally one to two years) implementation, work, or action plan for the maintenance of an organization’s urban forest and trees.
master plan:	An Urban Forest Master Plan (UFMP) is a road map providing detailed information, recommendations, and resources needed to effectively and proactively manage and grow a community’s tree canopy. More important, it provides a shared vision for the future of the urban forest to inspire and engage interested parties in the care and protection of trees.
minimize:	To do only that which is necessary and appropriate to accomplish the task or objective described or to reduce an action’s impacts.
mitigation:	1. Climate change mitigation consists of actions to limit the magnitude or rate of global warming and its related effects. This generally involves reductions in human emissions of greenhouse gases. 2. Reduce effect or impact (i.e. from tree removal).
native:	Species or ecological communities occurring naturally in an ecological region, as neither a direct nor indirect consequence of recent human activity. (Ecological Regions of North America: Levels I-II)
natural community:	Natural communities are combinations of native plants and animals that are regularly found together in particular settings. Human-caused disturbances have been minimal or are consistent with historical disturbance regimes (e.g., prescribed fire); the natural community has recovered from that disturbance; or the human-caused disturbance falls within the range of natural variation. (Adapted from NatureServe).
natural regeneration:	Establishment of a plant or a plant age class from natural seeding, sprouting, suckering, or layering.
nature-based solutions:	Sustainable planning, design, environmental management, and engineering practices that weave natural features or processes into the built environment to promote adaptation and resilience.
objective:	In the SFI Urban and Community Forest Sustainability Standard, a fundamental goal of sustainable forest management.
old-growth forests:	A forested ecosystem distinguished by old trees and related structural attributes, such as tree size, down woody debris, canopy levels, and species composition. Organizations should utilize a definition specific to their region and particular forest types.
organization:	Person or group of people that has its own functions with responsibilities, authorities, and relationships to achieve its objectives.
performance measure:	A means of judging whether an objective has been fulfilled.
plant health care:	Comprehensive program to manage the health, structure, and appearance of plants in the landscape.
planting:	The establishment of a group or stand of young trees created by direct seeding or by planting seedlings or plantlets.
policy:	A written statement of commitment to meet an objective or to implement a defined program or plan to achieve an objective or outcome.
practice(s):	The actual application or use of an idea, belief, or method, as opposed to theories relating to it.
principle:	The vision and direction for sustainable urban forest management as embodied in the principles of the SFI Standards.
program:	An organized system, process, or set of activities to achieve an objective or performance measure.
protection (or protect):	Maintenance of the status or integrity, over the long term, of identified attributes or values including management where appropriate and considering historical disturbance patterns, fire risk, and forest health when determining appropriate conservation strategies.



public land:	Land that is owned or administratively managed by a government entity (federal, state, provincial, county, or local), excluding easements or other encumbrances held by a government entity on private land.
qualified resource professional:	A person who by training and experience can make urban forest management recommendations. Examples include arborists, foresters, soil scientists, hydrologists, forest engineers, forest ecologists, and fishery and wildlife biologists, or technically trained specialists in such fields.
reforestation:	The reestablishment of forest cover either naturally or by seeding or planting of seedlings.
resilience or resiliency:	The overall capacity to recover from anthropogenic and natural disturbances.
riparian area:	Transition zone characterized by vegetation or geomorphology adjacent to rivers, streams, lakes, wetlands, and other water bodies.
SFI 2022 Audit Procedures and Auditor Qualifications and Accreditation:	The principles and guidelines that detail specific requirements to Certified Organizations and certification bodies for conducting audits to the SFI 2022 Forest Management, Fiber Sourcing, Chain-of-Custody, and Certified Sourcing Standards and the SFI Small Lands Group Certification Module and the SFI Small-Scale Forest Management Module for Indigenous Peoples and Families.
SFI certification:	A systematic and documented verification process to obtain and evaluate evidence objectively to determine whether a Certified Organization conforms to the requirements of SFI Standards and Rules.
SFI Implementation Committee:	A state, provincial, or regional committee organized by Certified Organizations to facilitate or manage the programs and alliances that support the growth of SFI certification, including sustainable forest management.
site:	1. A permanent location where an organization carries out work or a service. 2. An area in which a plant or forest stand grows, considered in terms of its environment, particularly as this determines the type and quality of the vegetation in the area can carry ( <i>Dictionary of Forestry</i> , Society of American Foresters).
soil health:	The continued capacity of soil to function as a vital living ecosystem that sustains plants, animals, and humans. (USDA)
special sites:	Sites that include geologically unique or culturally important features.
strategy:	Organized system, process, plans, or set of activities to achieve a goal or objective.
Sustainable Forestry Initiative (SFI):	SFI is a 501c(3) non-profit charitable organization, and is solely responsible for maintaining, overseeing, and improving the Sustainable Forestry Initiative. SFI directs all elements of the Sustainable Forestry Initiative and the SFI Standard(s), including forest management, fiber sourcing, and chain-of-custody certifications, and labeling and marketing. SFI is overseen by a three-chamber board of directors representing social, environmental, and economic sectors.
sustainable forestry:	To meet the needs of the present without compromising the ability of future generations to meet their own needs, by practicing a land stewardship ethic that integrates reforestation and the managing, growing, nurturing, and harvesting of trees for useful products and ecosystem services such as the conservation of soil, air and water quality, carbon, biological diversity, wildlife and aquatic habitats, recreation, and aesthetics.
technical expert:	A person who provides specific knowledge or expertise to the audit team (ISO 19011 2018, 3.16).

third-party verification and certification:	An assessment of conformance to the SFI 2022 Standards and Rules conducted according to the requirements of SFI Section 10 SFI 2022 Audit Procedures and Auditor Qualifications and Accreditation, and ISO 19011, by a qualified certification body.
threatened and endangered:	Listed under The U.S. Endangered Species Act or the Canadian Species at Risk Act and/or listed under applicable state or provincial laws requiring protection.
traditional forest-related knowledge:	Forest-related knowledge owned and maintained by Indigenous Peoples as a result of their traditional use of or tenure on forestland.
tree equity:	Tree equity is achieved when a community has enough canopy cover for residents to reap the health, economic, and other benefits that trees provide.
urban forest management plan:	A document that describes how urban forestry goals are to be accomplished within a defined time frame; includes tasks, priorities, best management practices, standards, specifications, budgets, and staffing analyses.
urban forest:	Trees, forests, greenspace, and related abiotic, biotic, and cultural components in areas extending from an urban core to the urban-rural fringe. Urban forests may include parks, street trees, landscaped boulevards, gardens, river and coastal promenades, greenways, river corridors, wetlands, nature preserves, shelter belts of trees, and working trees at former industrial sites. Urban forests, through planned connections of green spaces, form the green infrastructure on which communities depend (U.S. Forest Service).
urban forester:	An individual trained in or practicing urban forestry.
urban forestry:	Management of naturally occurring and planted trees and associated plants in urban areas or communities.
urban wood:	Woody biomass reclaimed from urban areas for other purposes, often at their highest and best use. Urban wood is a plentiful, local, and renewable resource with unique design characteristics.
verifiable monitoring system:	A system capable of being audited by a third party that includes: 1. A means to characterize the Certified Organization's wood and fiber supply area, which may include sources certified to a standard that requires conformance with best management practices, including those sources from certified logging professionals; 2. A process to identify and use sources of available data (e.g., state or provincial monitoring programs, certification status of suppliers) in the use of best management practices; and 3. A method to assess supplier performance, if needed, to supplement available data.
vernal pool:	A seasonal wetland with sufficient water present during amphibian breeding season, an absence of fish, and the presence of wetland obligate fauna.
wetland:	1. Seasonally or permanently water-logged areas characterized by vegetation adapted for life in saturated /flooded conditions; 2. Wetlands can be forested, shrubby, grassy, or open and may include bogs, fens, swamps, marshes, and shallow open water areas; 3. wetlands may be stagnant systems (e.g., bogs, vernal pools), slow flowing (e.g., fens, swamps), or have fluctuating water levels (e.g., marshes, shallow open water).
wildlife:	Aquatic (marine and freshwater) and terrestrial fauna