



City of Lakewood

Sidewalk Maintenance Program Procedure

Introduction

Sidewalks in the public right of way provide mobility opportunities for the City of Lakewood community members; residents, visitors and businesses. There are approximately 300 miles of various width sidewalks throughout the City. Sidewalks vary in age and in quality of condition. Trivial defects in sidewalks are inevitable and not every inequality or irregularity in the surface rises to the level that requires maintenance.

The City of Lakewood has limited employee and financial resources and cannot reasonably repair all sidewalks needing maintenance or replacement at any given time. Sidewalk maintenance and replacement is costly. Comprehensive sidewalk surveys are also expensive and require the use of limited City personnel and other resources. Under the California Streets and Highway Code, Sections 5610-5618, it is the duty of abutting property owners that they "...shall maintain any sidewalk in such condition that the sidewalk will not endanger persons or property and maintain it in a condition which will not interfere with the public convenience in the use of those works or areas..." (§5610). The City desires to keep sidewalks in a functional condition and has developed this Procedure for that purpose.

Responsibility

The Trees and Hardscape Supervisor in the Landscape and Hardscape Division of the Public Works Department is responsible for the administration and implementation of this Procedure.

The responsibility for this Procedure includes, but is not limited to:

- Determining the schedule, prioritization and work for sidewalk inspection and maintenance covered by this Procedure. The decisions to schedule, prioritize and work on sidewalk inspection and maintenance may be based on, but not limited to, the following factors:
 1. Severity of the sidewalk condition;
 2. Volume of pedestrian traffic;
 3. Implications for accessibility;
 4. Proximity to downtown businesses;
 5. Proximity to schools or senior centers; and
 6. Availability of City resources and funding to reasonably respond to the sidewalk conditions.

- Maintaining Site Inspection and Maintenance Logs for observed sidewalk conditions.
- Scheduling an initial response to the evaluation of a sidewalk condition based upon a scheduled, impromptu or citizen service request inspection of sidewalk conditions.
- Communicating with property owners in a reasonably timely manner.

Additionally, other City employees, such as Public Works, Building Inspector, or Code Enforcement employees, who are frequently in the field, are encouraged to view and report sidewalk conditions to the citizen service request system.

Inspections

There are three types of sidewalk inspection and repair schedules as follows:

1. Routine Inspections
2. Service Request Inspections
3. Injury, Accident or Special Inspections

The process for each differs as follows:

1. Routine Inspections and Repair

- Citywide inspections of all sidewalks during the 4-year grid cycle, corresponding with the grids identified on the Annual Tree Trimming Schedule zone map (Appendix A)
- Developing a corrective action plan
- Scheduling corrective action either through ramping, grinding or replacement of selected sidewalk segments with the intent to complete all repairs within the grid year identified, provided funding and resources allow
- Documenting the completion of the corrective action with dates of completion and photographs

2. Service Request Inspections and Repair

- Site assessment of sidewalk based upon citizen notification (service requests) within 30 days of notification, subject to the nature of the reported condition, staffing, emergencies, workload, and available resources
- Documenting inspections observations and corrective actions (if determined necessary) and assign priority level based on low, moderate or high priority (see below for the definition of low, moderate or high priority)
- Developing a temporary and final corrective action plan to include as needed:
 - Temporary patching within 30 days of assessment
 - Schedule the final repair to occur during the routine 4-year grid cycle provided the temporary repair is sufficient to bridge the timeframe. Alternately, if the severity of the defect requires earlier action, schedule the final repair as reasonably practicable in consideration of available funding and resources.
- Documenting the completion of the corrective action plan with notes and photographs

3. Injury, Accident or Special Inspections and Repair

- Site assessment of sidewalk as soon as practicable, generally within seven (7) days of notification, subject to the nature of the reported condition, staffing, emergencies, workload, and available resources
- Documenting inspections, observations and corrective actions (if determined necessary)
- Photograph area and displacement or defect (if observed) utilizing quantitative measuring device
- Developing a temporary and final corrective action plan utilizing the Service Request process

For these inspections, the City may also document contributing factors, when reasonably available, which may include:

- The date and time of inspection;
- Exact location and direction of pedestrian travel;
- Lighting and visibility;
- Weather and surface conditions;
- Nearby trees, vegetation, utility facilities, driveways, and obstructions;
- The width, depth, and height of the condition;
- The surrounding pedestrian route;
- Existing markings, patches, or prior repairs;
- Relevant prior service requests or inspection history; and
- Temporary measures and permanent corrective actions taken.

Photographs should include both close-up images with a measuring device and wider views showing the condition in context.

Condition Assessment

The California Government Code §830(a) states, a “Dangerous condition means a condition of property that creates a substantial (as distinguished from a minor, trivial or insignificant) risk of injury when such property or adjacent property is used with due care in a manner in which it is reasonably foreseeable that it will be used. A dangerous condition as a condition of property that creates a substantial (as distinguished from a minor, trivial, or insignificant) risk of injury when such property or adjacent property is used with due care in a manner in which it is reasonably foreseeable that it will be used.”

The following provides guidance for evaluating sidewalk conditions under California Government Code §§830(a) and 830.2:

- Height differential less than $\frac{3}{4}$ inch: May constitute a trivial defect, depending on surrounding circumstances. Evaluate whether rough or jagged edges, successive defects, obscuring debris, poor visibility, or other conditions warrant mitigation.
- Height differential of $\frac{3}{4}$ inch or more: Evaluate for mitigation and prioritize, schedule, and implement corrective action as warranted in accordance with this Procedure below.
- Regardless of height: Consider the overall condition and foreseeable use of the sidewalk when determining the appropriate response.

The condition of the sidewalk should be photographed to provide evidence in case a claim for damages occurs. Images of sidewalks should include:

- Date and Time of the inspection (or uploaded to GIS with metadata)
- The surrounding area(s) (i.e., trees, shrubbery, lawn fixtures, driveway approaches, and lawn where appropriate).
- Utilization of a tape measure, Tree and Hardscape measuring device or an object for scale to reflect any condition of concern. A straight edge may be used to help with documenting width and depth.

Sidewalk inspections should look for conditions likely to inhibit pedestrian access or are reasonably foreseeable to cause an injury or a claim for damages. The list of common sidewalk maintenance issues may include, but are not limited to:

- Displacement. Vertical displacements of $\frac{3}{4}$ inch or greater should be evaluated for mitigation based on the overall condition and surrounding circumstances, including poor lighting, obscuring foliage or debris, successive defects, and pedestrian use. Smaller displacements may also warrant mitigation depending on the circumstances.
- Badly cracked concrete. Evaluate to determine if mitigation is required based on circumstances. Examples to investigate include holes and rough spots or indentations wider than 1" inch with a depth greater than $\frac{3}{4}$ ".
- Spalled areas. Fragments of concrete or other building material detached from larger structures.
- Settled areas that trap water. Sidewalk segments with depressed areas, reverse cross slopes, or other indentations that make the sidewalk path lower than the curb. These depressions may trap silt and water on the sidewalk and may reduce the slip resistant nature of the surface.
- Tree root damage. Roots from trees growing in adjacent landscaped areas that cause the walkway surface to buckle and crack. During sidewalk installation or maintenance, the roots of a tree may be impacted. A qualified individual, such as an arborist, may need to be called upon to inspect the tree to see if it is structurally stable after cutting the roots. Remove the tree if determined necessary.
- Vegetation overgrowth. Ground cover, trees, or shrubs on properties or setbacks adjacent to the path that have not been pruned can encroach onto the path and create obstacles. Vegetation that takes root in sidewalk section joints and cracks can create trip hazards and barriers to access.
- Obstacles. Objects located on the sidewalk, in setbacks, or on properties adjacent to the sidewalk that obstruct the passage space.

As a general maintenance prioritization guideline, sidewalk displacements of approximately $1\frac{3}{4}$ inches or greater should ordinarily be considered for mitigation. This guideline is intended solely for maintenance planning purposes and does not determine whether a condition constitutes a dangerous condition of public property. Staff shall evaluate all conditions based on the totality of circumstances, including accessibility impacts, pedestrian use, visibility, lighting, surrounding conditions, prior complaints, and other relevant factors

Note that upon determination that a public nuisance may exist on any private property that is contributing to an adverse sidewalk condition, Public Works will refer the issue to the Code Enforcement Division for review and action.

Following inspections, a plan of action, in accordance with the Inspection Procedures listed above, is to be developed that pursues mitigation of the sidewalk condition and creates a schedule for maintenance or replacement to reduce the potential for an incident that is reasonably foreseeable to cause an injury or a claim for damages to occur.

The plan of action may include one or more of the following:

- Marking the sidewalk condition with high visibility paint
- Placing a barricade at the sidewalk condition
- Ramping a displacement with temporary asphalt concrete patch
- Grinding a displacement or Angle saw-cutting a displacement
- Filling of a hole or gap flush with the surface
- Removing and replacing the sidewalk extent

Maintenance or Replacement Procedure

The following procedures, singularly or in combination as needed, may be utilized based on the three identified Inspections listed above:

- Conduct an initial investigation within a reasonable timeframe upon receiving a complaint, service request or other notification.
- Implement temporary repairs as feasible or take the damaged section out of service, if needed, by use of barricades, appropriate posted signage, and/or pedestrian traffic detours to other sidewalks.
- Establish a maintenance priority.
- Enter the location into the GIS inventory including date, time, photographs, observation notes and recommendations.
- Use most appropriate maintenance method (see Maintenance and Replacement Options Section).
- Update GIS to document inspections and maintenance actions taken. For locations associated with a customer service request or complaint, update the related record in PIO's Service Request System.

Maintenance and Replacement Options

The following options are available for maintenance or replacement of sidewalks, subject to sidewalk condition, available resources and scheduling:

- Temporary Asphalt Concrete (AC) ramping: AC ramping is a temporary measure to resolve a height differential.
- Asphalt Concrete Overlay: AC overlays are effective as a temporary measure to smooth the surface of the concrete if the concrete is severely spalled or cracked.
- Crack Filling: Crack filling is a process that fills cracks and voids in concrete to even out the surface.
- Concrete Grinding: Concrete grinding is the process used to remove the upper surface of a slab of concrete by using an abrasive machine to eliminate a height differential.

- Angled Concrete Saw Cutting: Concrete saw cutting is the cutting from edge to edge of the sidewalk on an angle to create a ramp and eliminate a height differential.
- Removal and Replacement: Sidewalk removal and replacement is appropriate if severe damage has occurred to the sidewalk that cannot be corrected by one of the methods described above.

Priority Levels

Priority levels for sidewalk maintenance and replacement are determined as follows:

1. Low — No condition of concern or a trivial defect. No corrective action warranted at the time of inspection.
2. Moderate — Minor condition of concern. Minor maintenance or monitoring in a reasonable time in consideration of schedule, workload and budget limitations.
3. High — Major condition of concern. Schedule maintenance or replacement as soon as practicable in consideration of schedule, workload and budget limitations.

High-priority conditions shall be promptly referred to appropriate supervisory staff for review and determination of interim mitigation, repair method, and scheduling. The review and resulting decision shall be documented in the applicable GIS or service-request record. Greater importance is assigned to areas such as school zones, senior centers, business districts, and other high-volume pedestrian activity areas.

Record Keeping

All documentation and photos of sidewalk inspections, replacements, and maintenance are to be maintained by the Public Works Department in the GIS system. All customer service requests and complaints will be maintained in PIO's Service Request System. Records will be retained per the City's record retention policy. Records potentially relevant to a reported injury, claim, or litigation shall also be preserved in accordance with applicable litigation-hold requirements.

APPROVED:

Mayor

Date

APPENDIX A – SIDEWALK MANAGEMENT GRID MAP

