

**2012 ENGINEERING DESIGN STANDARDS AND PROCEDURES UPDATE**  
**Summary of Proposed Changes by Chapter**

**Objectives**

Springfield is currently amending the Glenwood Refinement Plan policies and objectives to provide for a new vision of the Glenwood Riverfront. The primary objective with the proposed 2012 updates to Springfield's *Engineering Design Standards and Procedures Manual* is incorporating several new design standards necessary to implement the new vision. In addition, numerous other updates are proposed that address current practice and other needs. Updates are proposed in the following Chapters of the Manual:

- Chapter 1 – Streets and Sidewalks
- Chapter 3 – Stormwater Quality
- Chapter 4 – Stormwater Capacity
- Chapter 5 – Traffic Standards
- Chapter 6 – Landscape Vegetation
- Chapter 8 – Erosion and Sediment Control Plan Design
- Chapter 13 – City Contract Projects

**Chapter 1 - STREETS AND SIDEWALKS**

Many of the proposed updates in Chapter 1 clarify existing standards, as well as adding new standards. Several of the more significant changes include:

- Section 1.02 requires compliance with the minimum fire code design standards for vehicle access when designing roadways.
- Section 1.02.10 prohibits using parabolic crown street cross-sections unless approved by the City Engineer and City Traffic Engineer.
- Section 1.02.11 requires that all new sidewalks are to be setback sidewalks unless approved by the City Traffic Engineer and City Engineer.
- Appendix 1A is the biggest addition to Chapter 1. This new Appendix was prepared to implement the new Glenwood Riverfront Street Cross-Sections Standards presented in Springfield's Glenwood Refinement Plan Update.

**Chapter 2 – SANITARY SEWERS AND PUMP STATIONS**

No changes.

**Chapter 3 – STORMWATER QUALITY**

Significant changes and new standards added to Chapter 3 include:

- Section 3.01 changes the reference to the design standards for stormwater quality facilities from Portland's Stormwater Manual to Eugene's Stormwater Management Manual. In addition, Section 3.02 Interim Design Standards was deleted in its entirety.

- New Section 3.02.3 includes the updated and expanded Water Quality Pollutants of concern to be consistent with the most recent stormwater discharge permit (MS4).
- New Section 3.02.7 is changed to clarify that parking lot maintenance activities include routine cleaning of stormwater catch basins and area drains.
- New Section 3.03 adds requirements for maintaining all private stormwater treatment facilities. The requirements include the property owner signing an operations and maintenance agreement. Notice of this agreement will then be recorded with Lane County to notify all future property owners of the terms of this agreement. The agreement clearly states owners responsibilities for maintenance to ensure the stormwater treatment facilities will function properly. The agreement also establishes access rights for the City to inspect these facilities on a regular, recurring basis.
- Three new forms added to Chapter 3:
  - Information Packet for Stormwater Quality Facility Operations & Maintenance Plan
  - Operations and Maintenance Agreement (template)
  - Notice of Operations and Maintenance Agreement (template)

#### **Chapter 4 – STORMWATER CAPACITY**

Significant changes and new standards added to Chapter 4 include:

- Section 4.03 clarifies the purpose of the Stormwater Scoping Sheet in site design and the criteria for preparing the various types of Stormwater Studies for development proposals.
- Section 4.03.5 includes objective criteria concerning when the City Engineer can require a downstream analysis of the stormwater system from any development that may be adding flow to the existing system.
- Section 4.04 adds HDPE pipe as an acceptable material for stormwater systems.
- Section 4.08 clarifies the design criteria for outfall structures.
- New Section 4.17 adds submittal requirements and objective design criteria for managing stormwater using Low Impact Design Approaches (LIDA) required for development and redevelopment sites within the Glenwood Riverfront Area of the Glenwood Refinement Plan and other suitable areas within Springfield or its UGB.

#### **Chapter 5 – TRAFFIC STANDARDS**

Significant changes and new standards added to Chapter 5 include:

- Section 5.01 requires compliance with the minimum fire code design standards for vehicle access when designing roadways.
- Section 5.02.1.B restricts using wood street light poles only to replace damaged poles or when installing additional lighting in an area that has wood poles used throughout to maintain consistency. In addition, City pole tags must be installed on all new poles, all new streetlights must be constructed with wire theft deterrents, and electrical circuit identification is required on the conduit of street light systems.

- Section 5.04 adds an intersection control standard such that when a project includes reconstructing or constructing new intersections, all intersection control types shall be evaluated using the City’s “Intersection Control Checklist”. Control types include no control, stops, signal, and roundabout. Specific Parking Lot design standards were removed and a requirement that all parking lot design must comply with the latest edition of the Institute of Transportation Engineers (ITE) Transportation and Land Development reference book and applicable Sections of the Springfield Development Code.
- New Section 5.09 adds the requirement to design on street parking design according to the AASHTO ‘A Policy On Geometric Design of Highways and Streets’, ITE guidance, the Springfield Downtown Parking Study, the Institute of Traffic Engineers design guidance, and any relevant Refinement Plans.

## **Chapter 6 – LANDSCAPE VEGETATION**

The title for Chapter 6 was changed from **Street Trees** to **Landscape Vegetation**. Expanding the scope of this Chapter to include other vegetation resulted in revising most of this Chapter. The more significant changes and new standards added to Chapter 6 include:

- Section 6.01 was expanded to include other vegetation in addition to street trees, as well as providing a list of objectives for utilizing vegetation and trees.
- Section 6.02 divides the General Design Consideration into new individual sections to address:
  - A. Street Trees
  - B. Medians and Planter Strips
  - C. Water Quality Facilities
  - D. Riparian area along rivers – Greenway and local Water Quality Limited Waterways
  - E. Natural Resource Areas – Local Wetlands
  - F. Riparian area along urban waterways
- Section 6.02.1 discusses retaining native vegetation if healthy and sound, that Best Management Practices (BMPs) such as fencing be applied to protect the vegetation, and root damage.
- Section 6.02.3 removes the former list of approved Street Trees and adds references to new Appendix 6A – Approved Street Tree List, and to Appendix 6B – Approved Vegetation List. This new Vegetation List references plants that are more appropriate to the Springfield area and/or native to the Willamette Valley (Lane County), and listed in the Eugene *Stormwater Management Manual*, thereby providing consistency to landscape designers and planners.
- Section 6.02.7 was added to remind property owners of their obligation to maintain vegetation for vision clearance, sidewalk clearance, and other vegetation management requirements. It also points to the Oregon Department of Agriculture list of noxious and invasive plants for prohibited plants in Springfield, and requirements in the Springfield Development Code concerning maintaining an approved use.
- Appendix 6A – Approved Street Tree List was added.
- Appendix 6B – Approved Vegetation List was added.

## **Chapter 7 – HILLSIDE DEVELOPMENT**

No changes.

## **Chapter 8 – EROSION AND SEDIMENT CONTROL PLAN DESIGN**

Significant changes and new standards added to Chapter 8 include:

- Section 8.02 clarifies the responsibility of the Engineer of Record for preparing the Erosion and Sediment Control Plan (ESCP).
- Section 8.03 was modified to recommend using the Oregon Department of Environmental Quality (DEQ) Erosion and Sediment Control Manual as a resource for preparing an ESCP.
- Section 8.05.2 deletes reference to Appendix 8A for Best Management Practices (BMPs) for erosion and sediment control. Rather, references to guidance provided by DEQ was added.
- Exhibit 8-1, a copy of Springfield's NPDES Stormwater Discharge Permit (1200-CA) issued in 2001, was deleted in its entirety.
- Appendix 8A is a copy of the 1200-C and 1200-CN Stormwater Discharge Permits in effect in Oregon until November 30, 2015.

## **Chapter 9 – DRAFTING STANDARDS**

No changes.

## **Chapter 10 – ELECTRONIC ACCEPTANCE STANDARDS**

No changes.

## **Chapter 11 – PRE-DESIGN**

No changes.

## **Chapter 12 – PUBLIC IMPROVEMENT PERMIT PROJECTS**

No changes at this time. City staff is working to streamline and clarify the procedures for Public Improvement Permit (PIP) Projects and anticipates releasing these revisions later in 2012.

## **Chapter 13 – CITY CONTRACT PROJECTS**

This Chapter will be deleted in its entirety. City staff is developing a separate Capital Project Management Guide that will detail the processes and procedures for delivering capital construction projects, other than PIP Projects, in Springfield.