

**ITEM V-C: ZONING ORDINANCE AMENDMENT – WATER EFFICIENT LANDSCAPE
ORDINANCE - FILE #2009PL-069 (OA-000022)**

REQUEST

Staff requests that the Planning Commission consider, accept public testimony, and recommend approval of a Zoning Ordinance Amendment relating to water efficient landscaping. The proposed Zoning Ordinance Amendment would add a new chapter (19.67), known as the Water Efficient Landscape Ordinance. The Ordinance Amendment responds to state legislation mandating stricter requirements for reducing landscape irrigation water consumption and waste.

SUMMARY RECOMMENDATION

The Planning and Redevelopment Department recommends that the Planning Commission take the following actions:

- A. Recommend that the City Council adopt the Negative Declaration;
- B. Recommend that the City Council adopt the three (3) findings of fact for the Zoning Ordinance Text Amendment; and,
- C. Recommend that the City Council approve the Zoning Ordinance Text Amendment.

BACKGROUND

In 2006, the State enacted legislation requiring the Department of Water Resources (DWR) to update the State Model Water Efficient Landscape Ordinance. The updated model ordinance contains several new landscape and irrigation design requirements aimed at reducing water consumption and waste in landscape irrigation. All local land use agencies are required to adopt the model ordinance, or develop an ordinance that is at least as effective by January 2010. Should no action be taken, the DWR model ordinance would automatically become effective in January 2010 by statute. For reasons cited below, staff has developed an ordinance tailored to meet the City's needs that is based on, and is at least as effective as, the model ordinance. The new Water Efficient Landscape Ordinance will be incorporated into the City's Zoning Ordinance (as Chapter 19.67) and will supersede the City's existing water efficient landscape requirements (Resolution #93-55).

In February 2008, DWR released a draft Model Landscape Ordinance for public review and comment. The City of Roseville was one of many agencies that found the DWR model ordinance difficult to interpret and administer and provided comments accordingly at available opportunities. DWR released the final draft of the updated model ordinance in May 2009. Changes were incorporated into the draft DWR model ordinance that addressed some of staff's concerns; however, the DWR model ordinance remains particularly difficult to interpret and contains provisions that are inconsistent with the City's established plan review process. In response, staff representatives from Planning, Environmental Utilities, and Parks drafted a new Water Efficient Landscape Ordinance that is based on the DWR model ordinance and meets AB 1881 requirements, but better suits the City's needs. Additional background and detail on the legislative history and the required changes is provided below.

Legislative History

The City of Roseville's current water efficient landscape requirements were enacted in 1993, following the State of California's passage of Assembly Bill (AB) 325, known as the *Water Conservation in Landscaping Act*. The *Water Conservation in Landscaping Act* required DWR to adopt a model water efficient landscape ordinance aimed at reducing irrigation water waste. Local land use agencies were required to adopt the model ordinance, adopt provisions that were at least as effective in conserving water as the model ordinance, or apply for an exemption. The City of Roseville opted to adopt requirements equivalent to the model ordinance known as the "*City of Roseville Water Efficient Landscape Requirements*." The City Council adopted the WELR document by resolution on February 17, 1993. While the requirements have been effective in helping to reduce water use over the years, they do not carry the weight of law and were applicable primarily to non-residential projects (commercial, office, industrial), apartment projects, and some model homes, but had limited application to single family residential.

In 2004, legislation was signed by the Governor (AB 2717) requiring the California Urban Water Conservation Council (CUWCC) to convene a stakeholder task force comprised of public and private agencies to evaluate and recommend proposals for improving the efficiency of water use in new and existing urban irrigated landscapes in California. The task force ultimately adopted 43 recommendations, including a recommendation for DWR to update the model water efficient landscape ordinance originally adopted by the State in 1993.

In 2006, a revised *Water Conservation in Landscaping Act* was enacted by the State of California (AB 1881, Laird), which incorporated most of the recommendations of the CUWCC Task Force. AB 1881 required DWR to update the 1993 model ordinance to reflect the task force's recommendations. Under the requirement of AB 1881, local land use agencies are again required to adopt a water efficient landscape ordinance that meets or exceeds the requirements defined by DWR. AB 1881 also requires the California Energy Commission, in consultation with DWR, to adopt performance standards and labeling requirements for landscape irrigation equipment, including: irrigation controllers, moisture sensors, emission devices, and valves to reduce the wasteful, inefficient, or unnecessary consumption of energy or water.

DWR Model Ordinance Objectives

Objectives of AB 1881 and the DWR model ordinance are as follows:

1. Encourage appropriate use of plants
2. Establish "water budgets" for properties and describe penalties for exceeding established water budgets
3. Require automatic irrigation systems and schedules
4. Require soil assessment / soil management
5. Promote use of, and manage, recycled water resources
6. Minimize overspray and runoff

EVALUATION

The City's proposed ordinance addresses the objectives of the DWR model ordinance by incorporating the new water efficient landscape requirements into a new chapter of the Zoning Ordinance (Chapter 19.67). As a result, the water efficient landscape requirements will carry the weight of law, and violations may be subject to enforcement similar to any other violation of the Municipal Code.

Attachment 1 contains a matrix comparing the differences between the City's existing water efficient landscape requirements and the proposed ordinance. Many of the measures, such as the submittal requirements and documentation, are already required in some form by the City, or are considered industry best practices and are already being implemented by landscape architects and contractors. Other measures are new and are mandated by the DWR model ordinance.

Applicability

The proposed Water Efficient Landscape Ordinance will apply to the following landscape projects:

- All public agency projects (including parks¹) and private non-residential projects (i.e., commercial, office, industrial, etc);
- Developer-installed landscaping exceeding 2,500 square feet (of planting area) in single-family residential projects (attached or detached);
- Developer-installed landscaping less than 2,500 square feet (of planting area) in single-family residential projects (attached or detached) shall comply with the following:
 - Turf shall not comprise greater than fifty percent of the front yard planting area.
 - The irrigation system shall be operated by an automatic controller with a minimum 7-day calendar, three cycle per day capacity, dual programs, watering time adjustments down to two minutes, and a rain switch.
 - A four season irrigation schedule shall be provided to the new homeowner.
- Multi-family residential projects (apartments, condominiums, etc);
- Homeowner-provided (or hired) landscaping with a planting area equal to or greater than 5,000 square feet. This applies to new construction and landscape rehabilitation projects.
- Cemeteries, with exceptions for water use allowance (cemeteries have a higher demand for turf)

Specific Exemptions

The ordinance would not apply to the following projects:

- Registered local, state, or federal historic sites;
- Ecological restoration projects that do not require a permanent irrigation system; and,
- Plant collections, as part of botanical gardens and arboretums open to the public.

Relationship to Other Documents

Specific Plan Consistency - Landscape and irrigation plans are required to comply with the design guidelines outlined in each of the specific plans, if applicable. If inconsistencies arise between the Ordinance and other policy documents, the more restrictive requirement shall govern, with the exception of the Village Center in the West Plan. Due to its unique nature, the West Roseville Specific Plan Design Guidelines shall guide landscape design for the remaining undeveloped properties within the Village Center boundaries.

Plant Water Use Information – the City’s existing water efficient landscape requirements contains a tree and plant list and identifies water use information for a variety of species. The DWR model ordinance requires use of a state-recognized publication for plant water use, known as the Water Use Classification of Landscape Species (WUCOLS) published by UC Davis, DWR, and the Bureau of Reclamation. Rather than incorporate the entire plant list, the proposed ordinance incorporates the WUCOLS document by reference. This approach is preferred, since it eliminates the need to update the Zoning Ordinance every time the WUCOLS document is revised or updated.

Notable Changes from Existing Requirements

¹ Parks are required to comply with the same design parameters as any other project; however, play fields are defined as “Special Landscape Areas” (SLA) and are allowed to use a 1.0 evapotranspiration adjustment factor to account for water use needed to sustain turfgrass in play fields. New or retrofitted public or private golf courses are also included in the SLA category.

Establishes “Water Budgets” – The proposed ordinance establishes a lower evapotranspiration² (ET) adjustment factor (from 0.8 to 0.7), which ultimately reduces the maximum allowable amount of artificially applied water. The reduction in applied water allowance will likely influence design and plant selection, and will likely limit turfgrass. The ET factor is used in the formula that determines the Maximum Applied Water Allowance (MAWA).³

Irrigation Systems & Schedules

- Irrigation controllers will be required to incorporate weather-based, soil moisture-based, or other self-adjusting technology. (Current City requirements recommend the use of this technology);
- Sensors (e.g., rain, freeze, wind, etc.) are required that suspend irrigation during unfavorable weather;
- Region-specific evapotranspiration data must be used in irrigation scheduling.

Overhead Irrigation Restrictions

- Overhead irrigation is restricted to the hours of 8:00PM to 10:00AM only, unless unfavorable weather conditions are present that would be detrimental to plant health (e.g., frost/freeze). Irrigation using recycled water will remain limited to a slightly stricter watering window of 9 PM to 6 AM, which is necessary to minimize direct human contact.
- Subsurface or low flow irrigation will be required for landscape and median areas less than eight feet in width;
- No overhead irrigation will be allowed within 24 inches of any non-permeable surface. Allowable irrigation within the setback from non-permeable surfaces may include drip, drip line, or other low-flow technology. The 24-inch “setback area” may be planted or unplanted. Recognizing the difficulty in designing irrigation systems to meet this design parameter, this requirement may be modified if:
 - Landscape area is adjacent to permeable surfacing (e.g. porous pavement, paver stones, etc) and no overspray and runoff occurs;
 - The adjacent non-permeable surfaces are designed and constructed to drain entirely to the landscaping; or,
 - The irrigation designer specifies an alternative design or technology that demonstrates compliance with irrigation system design criteria and demonstrates that no overspray or runoff will occur.

Turf restrictions

Recognizing that the 1,196 dedicated irrigation accounts in the city (which are dedicated solely to landscaping) comprise 25% of the City's total water demand, and residential customers use approximately 50% of their water outdoors, staff recommends an additional measure not included in the DWR model ordinance. In an effort to further reduce irrigation water use, Planning and EUD staff recommends that turf be limited to no greater than 50% of the total landscaped area in non-residential projects, and 50% of the front-yard planting area in residential projects (including single-family). This would not apply to “special landscape areas” such as active parks and playfields. The draft ordinance reflects this recommendation.

Monitoring and Enforcement

AB 1881 contains provisions that statutorily require local agencies to monitor landscape water use and ensure compliance with the water efficient landscape ordinance. Due to limited budget and staff resources, the City does not have the ability to conduct periodic site inspections to verify compliance. The Planning Department will be responsible for ensuring that construction plans comply with ordinance requirements during plan check, and will verify general compliance in the field during site inspections for final occupancy

² Evapotranspiration (ET) means the loss of water to the atmosphere by the combined processes of evaporation and transpiration.

³ MAWA means the upper limit of annual applied water for the established landscape area. MAWA is based on the areas reference ET, the ET adjustment factor, and the size of the landscaped area.

of non-residential and multi-family projects. The Building Department will be responsible for verifying general compliance during single-family residential inspections, as the Planning Department does not inspect single family dwellings.

Post-construction enforcement will fall to the City's Water Conservation Division within the Environmental Utilities Department (EUD), which also enforces the provisions of the City's Water Conservation Ordinance.

EUD monitors irrigation water use through monthly billing cycles and will compare a site's actual water use against its approved irrigation water budget. Where a property exceeds its established water budget, EUD staff will take steps to notify the property owner that corrective action is needed.

Compliance with the water efficient landscape ordinance will also rely on self-certification by landscape architects and landscape installers, who will be required to sign affidavits verifying that the landscaping has been designed and installed to comply with the ordinance. Self-certification is effective, as it requires licensed professionals to sign against their license, who could then be subject to disciplinary procedures through their respective license governing boards.

PUBLIC OUTREACH

Planning staff presented the proposed requirements at an EUD-sponsored workshop for irrigation designers on March 9, 2009. The draft ordinance was posted for public review on July 15, 2009 on the City's website, at all three public libraries, the City Clerk's Office, and Permit Center. Copies of the draft ordinance have also been circulated to the Sierra Vista Specific Plan landowners group for review and comment. A notice of public review was advertised in an eighth-page ad in the Roseville Press Tribune on July 18, 2009, inviting public comment. Lastly, a public hearing notice and notice of availability of the negative declaration was published on August 8, 2009 in the Roseville Press Tribune.

Staff also forwarded the draft ordinance and pertinent background to the Roseville Chamber of Commerce in July and has offered to make an informational presentation to one or more of the Chamber's subcommittees. Staff also forwarded the draft ordinance and background to the Northstate Building Industry Association with an offer to make an informational presentation.

CONCLUSION

Adoption of the proposed Water Efficient Landscape Ordinance is necessary to comply with recent legislation requiring more stringent standards for landscape irrigation. The proposed ordinance responds to the State's mandate to adopt requirements that are at least as effective as the state model ordinance. Lastly, the proposed ordinance is easier to interpret and administer than the state model ordinance. Staff therefore recommends that the Planning Commission recommend approval of the proposed text amendments to the City Council.

ENVIRONMENTAL DETERMINATION

The Planning and Redevelopment Director has concluded that this project will not have a significant effect on the environment. As such, an Initial Study and Negative Declaration have been prepared in accordance with the provisions of the CEQA Guidelines as the environmental document for this project (Exhibit A). The Initial Study and Negative Declaration were posted for a 20-day public review and comment period on August 7, 2009. The comment period closes on August 27, 2009. At the time this report was written, no comments had been received on the Initial Study / Negative Declaration.

RECOMMENDATION

The Planning & Redevelopment Department recommends that the Planning Commission:

- A. Recommend that the City Council adopt the Negative Declaration;
- B. Recommend that the City Council adopt the three (3) findings of fact for approval the **ZONING ORDINANCE TEXT AMENDMENT**, adding Chapter 19.67 to the Roseville Municipal Code (Zoning Ordinance) – **FILE #2009PL-026 (OA-000022)** as stated below:
 - 1. *The proposed Zoning Ordinance Text Amendment is consistent with the public interest, health, safety, and welfare of the City;*
 - 2. *The proposed Zoning Ordinance Text Amendment is consistent with the City of Roseville General Plan; and,*
 - 3. *The proposed Zoning Ordinance Text Amendment is necessary to comply with state legislation.*
- C. Recommend that the City Council approve the **ZONING ORDINANCE TEXT AMENDMENT**, adding Chapter 19.67 to the Roseville Municipal Code (Zoning Ordinance) – **FILE #2009PL-026 (OA-000022)** as provided in **Exhibit B**.

ATTACHMENTS

- 1. Comparison Chart of Existing versus Proposed Water Efficient Landscape Requirements
- 2. Department of Water Resources Model Ordinance

EXHIBITS

- A. Initial Study / Negative Declaration
- B. Proposed Chapter 19.67 of the Roseville Municipal Code (Water Efficient Landscape Ordinance)