

CHAPTER 19.71

URBAN FORESTRY ESTABLISHMENT AND CARE

Sections:

19.71.010	PURPOSE AND INTENT
19.71.020	DEFINITIONS
19.71.030	URBAN FORESTRY BOARD
19.71.040	URBAN FORESTRY TEAM
19.71.050	TREE PROTECTION
19.71.060	TREE CARE GUIDELINES
19.71.070	TREE SELECTION
19.71.080	EXISTING REGULATIONS AND PERMIT REQUIREMENTS
19.71.090	OFFENSES AND ENFORCEMENT MEASURES
19.71.100	NUISANCE DETERMINATION AND REMOVAL PROCESS

19.71.010 PURPOSE

A. **Description and Benefits.** An urban forest is the assemblage of trees in a community that line streets, enhance parks, public spaces and grow wild or are planted in open spaces that this ordinance seeks to protect and enhance. The urban forest includes trees in commercial centers, schools, industrial parks and residential areas, for which property owners provide care and protection. As a City grows, a well-maintained urban forest grows with it providing a sense of permanence, a source of civic pride, and enhancing the quality of life for its citizens and visitors. Urban forests are also a cost effective means of addressing critical community and regional issues ranging from improving local air quality to combating global climate change. The benefits of an urban forest are many:

1. Trees produce oxygen and remove carbon dioxide from the air.
2. Trees enhance community attractiveness by softening views of buildings, parking lots, and streets.
3. Trees capture storm flows at their base and moisture and rain in their leaves, thereby reducing urban runoff and decreasing pollution of water bodies.
4. Trees provide energy-reducing shade to significantly cool buildings, pavement and the microclimate (the urban “heat-island” effect).
5. Mature trees have considerable value and increase property values.
6. Trees provide habitat to birds and other species.
7. Trees promote neighborhood walkability, friendship and healthful pursuits.
8. Healthy, mature trees on a public street demonstrate responsibility and stewardship of natural resources, creating a source of civic pride.

B. Purpose

1. To establish and maintain a healthy urban forest in the City of Perris.
2. To create an Urban Forestry Board to guide the City in the establishment and care of its urban forest.
3. To establish guidelines for the planting, care and maintenance of trees within the City.
4. To ensure the protection of trees during development and redevelopment of properties in the City.
5. To avoid conflict between trees and utilities and other public improvements.
6. To identify public hazard and nuisance trees, and establish removal procedures.

C. **Intent.** By these procedures and standards it is the intent of this ordinance to establish, maintain and protect a thriving urban forest to benefit all who live, visit or work in the City of Perris.

19.71.020 DEFINITIONS

The following definitions apply in this chapter:

“Arborist” is a person possessing the technical competence through experience and related training to provide for or supervise the management of trees or other woody plants in a landscape setting; an expert in the cultivation and care of trees that is certified by the International Society of Arboriculture (ISA) or another nationally recognized tree research, care, and preservation organization.

“Arborist Report” is a technical report that identifies the species, size and condition of tree(s), and identifies the nature of the tree work to be undertaken and appropriate protection. It will provides reasons for any proposed project-related pruning (limbs or roots) or destruction, and describes tree mitigating activities to be implemented. It details specific information about the tree(s) in question including location, condition, structural integrity, life expectancy, disease, infestations and vigor. The Arborist Report must include specific information in both drawing and text format.

“Bark” means the tissue on the outside of the vascular cambium. Bark includes all tissues of the main stem, lateral parts and below-ground parts between the xylem and the epidermis of the phylum.

“Cambium” means the layer of living cells between the bark and hardwood that each year produces additional wood and bark cells. This layer is responsible for the diameter growth of a tree.

“Central leader” is the single main stem or trunk of a tree. For most trees, it is important to have just one central leader to provide strength and stability. Exceptions include some fruit trees and topiaries where a straight form is not desired.

“City Property” is land owned by the City, including all lands dedicated to the public and administered by the City, including City parks, street right of way, and street medians.

“Crown” consists of the living branches and their foliage. The **crown projection area** of a tree is the area of the vertical projection of the outermost perimeter of the crown on the horizontal plane.

“Crown Raising Pruning” is the practice of removing branches from the bottom of the crown of a tree to provide clearance for pedestrians, vehicles, buildings, or lines of sight. For street trees, the minimum clearance is typically specified by ordinance. After pruning, the ratio of the living crown to total tree height should be at least two-thirds (e.g., a 15 foot tall tree should have living branches on at least the upper 10 feet).

“Crown Reduction Pruning” is a method of pruning used to reduce the height of a tree. It is typically used when a tree has outgrown its permitted space. Branches are cut back to laterals that are at least one-third the diameter of the limb being removed. Crown reduction pruning is a method of last resort that can result in large pruning wounds to stems that may lead to decay. This method should not be used on a tree with a pyramidal growth form.

“DBH” means “diameter at breast height”. DBH is commonly measured at 54 inches (4.5 feet) above natural grade. This is a commonly used term for tree diameter used throughout this section.

“Deciduous” trees and shrubs lose their leaves after each growing season, often preceded by a change of colors. “Evergreen” trees do not lose their leaves.

“Dripline” is a projected line on the ground that corresponds to the outer circumference of the tree canopy branches. This is where the tiny rootlets are located that take up water for the tree. Trees should be watered here, not by the base of the trunk, to avoid root rot.

“Epicormic sprouts” are narrow shoots or clumps of shoots produced along the trunk, or the suckers that grow from the ground around the base of the tree. Water sprouts are a form of epicormic sprouts that occur on stems and branches. Epicormic sprouts often form in response to the sudden exposure to light in a forest setting, but in urban areas they are more often associated with stress to the tree. In older wood, epicormic shoots often result from severe defoliation or radical pruning.

“Excessive Pruning” means removal of more than one quarter of the functioning leaf and stem area of a tree in any 12-month period.

“Hazardous Tree” is a tree which by reason of disease, infestation, age or other condition presents a known and immediate hazard to persons or to public or private property.

“Heat Island Effect” is a phenomenon that occurs in urban areas after natural land cover is replaced with paving, buildings, roads, parking lots, and other structures. Air pollution becomes trapped, resulting in higher outdoor temperatures. Urban heat islands can be as much as 10°F hotter than the surrounding undeveloped areas. The heat island effect can be mitigated by vegetation, green roofs, and light-colored materials that reflect heat.

“Heritage Tree” is a tree or a stand of trees that is designated to be of landmark importance by the Urban Forestry Board due to age, size, species, location and/or ecological, cultural or historic importance that may not be harmed, and for which removal can only be granted by petition to the Urban Forestry Board upon merit.

“Landscape Design Guidelines and Technical Manual” is Section 19.70.040 of the Perris Municipal Code, which describes landscaping requirements by development type and location. The separate Technical Manual is an appendix that includes irrigation, landscape and planting detail sheets, Water Use Classifications of Landscape Species (WUCOLS), and the Approved Tree List as adopted by the City. Reference to detail sheets shall be indicated as “Detail P-2”, “Detail L-3”, etc. This appendix will be referred to as the Technical Manual for Landscape Design.

“Mitigation” means the methods of tree replacement, direct costs, and/or retention used to lessen the environmental impact of development.

“Mulch” is organic material or rock placed over the soil surface of a planting area which serves the same function as leaf-litter in a natural forest environment.

“Nuisance Tree” is an undesirable tree that by reason of aesthetics, disease, damage, location, or other valid reason is eligible for removal as determined by the Director of Public Works, on the advice of the City Arborist, or his/her designee.

“PMC” – means the Perris Municipal Code.

“Protected Tree” includes all special status trees designated as such by age, size, species, location, cultural and/or ecological or historic importance that may not be harmed. Protected Trees include, but are not limited to City trees, Heritage Trees, specimen trees, and trees required by ordinance and/or as a Condition of Approval for development. Protected Trees carry penalties for unauthorized removal.

“Removal” means the cutting or removing of 50% or more of a crown, trunk, or root system of a tree, or any action which results in the loss of aesthetic or physiological viability, or causes the tree to fall or be in immediate danger of falling.

“Root Zone” means the area and volume of soil around the tree in which roots are normally found. May extend to three or more times the branch spread of the tree, and be either deep or shallow in depth. Tree roots cannot grow in compacted soil.

“Special Status Tree” is the same as a Protected Tree.

“Specimen Tree” is a tree planted for its attractiveness and statement ability, often used as an entry monument or to mark a special location. Another class of Protected Tree with penalties for unauthorized removal.

“Street Tree” is any tree that is growing along a street within the public right of way. Only trees listed in the Street Tree List or those specifically approved by the Urban Forestry Board, Development Services Director or his/her designee may be planted as street trees.

“Street Tree List” is the list of approved tree species that may be planted within the public right of way found in Approved Tree List appendix of the Technical Manual for Landscape Design.

“Topping” is a poor pruning practice often used to control the size of trees, especially height, and involves the indiscriminate cutting of branches and stems at right angles leaving long stubs. Synonyms include rounding-over, heading-back, dehorning, capping and hat-racking. Crown reduction pruning is the preferred method to reduce the size or height of the crown of a tree, but is rarely needed and should be used infrequently.

“Tree” means a standing woody plant having a trunk(s) two inches or more in diameter when measured 4.5 feet from the ground. If the tree is on a slope, the measure is taken on the uphill side. The anatomy of a tree consists of approximately 5% leaves, 15% branches, 60% trunk, 15% large transport roots, and 5% fine feeder roots. A tree has three main characteristics:

- it is a woody perennial plant,
- with a single main stem, or in case of a multi-trunked specimen, several stems, and
- it has a more or less definite crown.

“Urban Forest” is the assemblage of trees in a community that line streets, enhance parks, public spaces and grow wild or are planted in open spaces that this ordinance seeks to protect and enhance. The urban forest also includes trees in commercial centers, schools, industrial parks and residential areas, for which the property owners are responsible for care and protection.

“Urban Forestry Board” is the board comprised of the current Planning Commission members that guide and implement the City’s tree program. Also called the “Tree Board.”

19.71 - 6

C:\USERS\YVONNE\APPDATA\LOCAL\MICROSOFT\WINDOWS\TEMPORARY INTERNET
FILES\CONTENT.OUTLOOK\JQ2KMVF7\19 71 URBAN FORESTRY - 2009 (2).DOC

19.71.030 URBAN FORESTRY BOARD

- A. Purpose.** The Urban Forestry Board shall implement the City's tree policies and programs, and set the direction and scope of tree-related activities.
- B. Creation of an Urban Forestry Board.** The Urban Forestry Board shall be composed of the current members of the Planning Commission, as appointed by the Mayor and City Council, for the duration of the Planning Commission term. Vacancies will be filled in the same manner as the Planning Commission. The Urban Forestry Board serves at the convenience of the City Council, who charges it with responsibilities. The Chairperson and secretary of the Planning Commission shall be the Chairperson and secretary of the Urban Forestry Board.
- C. Duties and Responsibilities.** The Urban Forestry Board duties and responsibilities may include:
1. Developing applications and approval procedures for tree-related activities. Applications will be available to the public and returned for review and approval by the Urban Forestry Board or their designee.
 2. Conducting public hearings to provide direction on City-wide policies and programs regarding tree activities and actions.
 3. Promoting tree planting and tree care practices intended to grow and maintain the City's urban forest.
 4. Overseeing the development of tree regulations regarding planting, maintenance and removal on City property.
 5. Developing a process for the selection and designation of heritage trees and other trees of significance.
 6. Maintaining the list of designated heritage trees.
 7. Developing and implementing tree inventory processes.
 8. Recommending policies regarding trees on public and private land.
 9. Developing a Street Tree List
 10. Recruitment of volunteers from the community to work toward the community forestry goals.
 11. Any other activity deemed appropriate by the City Council.
- D. Designation of a Heritage Tree.** The process for designating a Heritage tree will be determined by the Urban Forestry Board. Trees may be nominated by the property owner and approved by the Urban Forestry Board.
- E. Removal of a Heritage or Protected Tree.** The process for removal of a Heritage or other Protected Tree shall be in accordance with the provisions established by Section 19.71.100.

19.71.040 URBAN FORESTRY TEAM

- A. Urban Forestry Board.** The Urban Forestry Board oversees the activities of the Urban Forestry team, which includes City staff, professional tree care providers, individuals, or groups with responsibility for trees in the community, including volunteers. The City's Urban Forestry staff includes the Directors of the Development Services and Public Works Departments, and the City's consulting landscape architect and Arborist.
- 1. Development Services Department.** The Director of the Development Services Department has primary responsibility for implementation of urban forestry policies and ordinances. The Planning Division staff provides recommendations to the Urban Forestry Board, Planning Commission, and City Council for modifications to the General Plan and Zoning Code, reviews development projects and landscaping plans, and enforces project Conditions of Approval. Planning staff also promotes Urban Forestry goals, obtains and administers tree grants, and hosts annual Arbor Day celebrations and other public outreach activities.
 - 2. Public Works Department.** This Department provides the daily care, management and emergency services required to sustain an urban forest, including tree planting and tree care services, installation and maintenance of irrigation systems. The Public Works administrative staff may provide clerical support and upkeep of a computerized tree inventory, and respond to calls from the public with questions or concerns about trees. Public Works staff works closely with the Director of Development Services, the City Arborist and landscape architect, and has oversight responsibility for tree care crews performing permitted work on City trees.
- B. Tree Care Crew.** Under the supervision of the Public Works Director, tree care crews provide daily tree services and maintenance from tree planting to removal:
- 1. Certified Arborist.** The City prefers to use landscape firms that specialize in tree care for all tree work. Any City-contracted tree company should employ a full-time certified Arborist accredited by the International Society of Arboriculture (ISA). This person will ensure that contracted tree crews perform work according to the City specifications.
 - 2. Certified Tree Workers.** All persons performing tree work on City trees should be trained according to tree care standards accepted by the International Society of Arboriculture (ISA), and ANSI Standard A-300 (practices) and Z-133 (safety) for all tree work on public land.
 - 3. Certified to Work Around Electric Lines.** All persons performing tree work on City trees in or around primary electrical lines must be trained to do so according

to the “Electrical Safety Orders” of the State of California, including all amendments and revisions.

4. **Contractor Qualifications.** All contractors are required to have a state contractor’s license for tree work (C-61) and shall adhere to the specifications provided in the bid documents.
5. **Insurance Requirements.** All contractors shall post City-required Worker’s Compensation, surety bonds and liability insurance prior to commencement of work.
6. **Education of Tree Crew.** The Public Works Director will acquire or develop training materials oriented toward City field tree-service crews and their supervisors, on the following topics and others as needed:
 - a. Public policies, ordinances, etc;
 - b. Tree anatomy and growth;
 - c. Tree reactions to injury and decay;
 - d. Tree maintenance standards (ANSI Standard A-300);
 - e. Safety and aerial rescue (ANSI Standard Z-133); and
 - f. Utility pruning techniques.

19.71.050 TREE PROTECTION

The urban forest canopy is an essential resource to be preserved and protected. Tree protection extends generally to all public trees and some private trees that contribute to the City’s urban canopy cover and do not fall into the category of hazardous or nuisance trees. Protected Trees are trees that are protected by code from damage and unauthorized removal. These fall into two categories: special status trees, as defined in Section 19.71.020, Definitions, and as described below.

A. Protected Public Trees. Protected Trees, including Heritage Trees and Specimen Trees, are defined in Section 19.71.020. Protected public trees in the City of Perris include, but are not limited to, the following:

1. Street trees in parkways, medians, landscape easements, and Landscape Maintenance Districts. Neighborhood street trees may be located within a landscape setback area or easement adjacent to the sidewalk or curb.
2. City park trees and other trees associated with City recreational amenities.
3. The historic trees on the Perris City Hall campus.
4. Existing or future trees planted to enhance the City’s entry identification monumentation.
5. Trees incorporated into City-themed identification and/or enhancements to freeway overpasses, such as embankments on State-owned (CalTrans) property.
6. Other public trees located on other types of City-owned or controlled land.
7. Public trees located within other types of easement areas (such as utilities).

B. Protected Privately Owned Trees. Trees on private property are an important component of the City's urban forest. Some are protected and regulated under the provisions of the municipal code, while others are not. A mature tree shading the backyard of a home is exempt from regulation, however, front yard trees, including the street tree, are not. All private property owners are actively encouraged to protect mature trees on their property. Protected privately owned trees include, but are not limited to, the following:

1. **Trees required as a project Condition of Approval.** One of the best ways to protect existing trees is through project design. These trees provide many benefits to development projects including, but not limited to, the following purposes:
 - a. **Monument trees** planted to enhance and identify development projects (commercial, residential or industrial), generally located at or adjacent to a significant intersection.
 - b. **Screening or buffering** of an objectionable view from the public right of way or adjacent property.
 - c. **Aesthetical considerations** such as enhancement of a building, development site or project open space.
 - d. **Shade trees** in parking areas, along walkways, interior roadways, and near building entrances.
 - e. **Front yard trees** (a designated species, minimum of one per lot) required in new residential tracts in addition to street trees.
2. **Trees on environmentally sensitive land** including, but not limited to, open space, flood zones, MSHCP conservation areas, and areas to be included within the City's future trail system.

C. Protection from Neglect and Abuse. The City's urban forest will receive care and protection as provided in Tree Care Guidelines (see Section 19.71.060).

1. **Proper Tree Care.** Trees cannot thrive without proper attention to location, planting, and continuing care. Continued good appearance and health depends on the extent and quality of maintenance of the tree and its irrigation system. Proper measures shall be taken to ensure the irrigation system remains optimally functional.
2. **Protection from Abuse.** Trees shall be protected to the extent feasible from neglect, damage, and abuse. Trees shall be planted and maintained in desirable locations, and deliberate vandalism is punishable as per the Municipal Code. (See also Section 19.71.090.A)
3. **Property Owner's Responsibility for Trees.** It shall be the duty of the property owner to properly care for trees on their property to maintain their health and usefulness, and prevent hazardous tree conditions that may result from neglect and damage. Whenever possible, good quality trees should be preserved on the

site of anticipated development or remodeling activity. (See Subsection E, below).

- D. Permitted activities regarding City trees.** Only City workers or City tree contractors can plant, trim or remove a tree on City property. All public trees planted in the City shall be cared for and maintained in accordance with the standards set forth in this chapter (19.71.060, Tree Care Guidelines) and other appropriate provisions of the Municipal Code, including Section 19.70, Landscaping, and the Technical Manual for Landscape Design.
- E. Protection of trees during construction.** Site plans shall identify the location of all existing trees with the DBH of 6” or larger for projects on public land, easement-laden land, or private land on site, and indicate whether such trees will be preserved and incorporated into the final landscaping plan or removed. For trees whose species, condition and location justify their preservation, a tree protection plan shall be prepared that identifies the location of trees to be preserved, and sets forth protection instructions based on the recommendations of an Arborist. Protection instructions shall include, at a minimum, measures to:
1. Plot existing trees with a DBH of 6” or larger on the site plan as part of the development application.
 2. Protect tree roots, trunk(s), branches, and foliage for any tree on City property during any type of construction activity or project (excavation, demolition or any other type of disturbance) by evaluating planned construction, including grade cuts and fills (see Section 19.71.060.I, Tree Root Protection), paving, materials storage, traffic and parking, fencing, disposition of toxic materials, washing and maintenance of equipment, etc., in the critical root zone of trees to be saved, and provide mitigation measures to minimize damage to trees in such areas.
 3. Provide an appropriate interface between construction areas and tree-save zones as part of the landscaping plans.
 4. Educate work crews and their supervisors regarding the steps needed to preserve existing trees on site.
 5. Post advisory signs with tree protection requirements.
 6. The project Conditions of Approval shall identify when Protected Trees are on a property, and the location of such trees shall be indicated on the approved site plan. This information shall also be listed in the Notes section of the construction plans prior to the issuance of a grading or building permit.
 7. Removal requests for trees that cannot or should not be preserved during construction will be reviewed by Planning staff in consultation with the City Arborist. An Arborist’s Report may be required.
- F. Tree grates, grilles and pavers.** Trees require adequate planting area for roots to develop and surface area to allows roots to receive water, air and nutrients. Decorative

grates, grilles and pervious pavers allow surface water and air to access the roots, and allow the root collar to expand within a defined area. Tree grates and grilles are constructed of cast iron or lightweight structural plastic, and may include removable intermediate expansion rings.

- G. **Parking lot trees.** Assuming excellent tree care, an urban parking lot tree has the ability to survive and thrive beyond the typical 7-10 years to 50 years good with soil conditions. Soils beneath parking lots are typically heavily compacted, limiting the root space and oxygen available to trees and affecting their ability to survive and thrive. To balance the parking lot tree's need for adequate rooting area with maintaining the structural integrity of the surrounding pavement, it is recommended that a structural soil mixture be installed around parking lot trees instead of the standard aggregate base. An innovative structural soil mix developed by Cornell University provides both the compaction needed below parking lot paving and an accessible rooting environment for parking lot trees.

19.71.060 TREE CARE GUIDELINES

The care and maintenance of an urban forest is a long term investment in a valuable resource. The majority of Perris's urban forest is young, so the proper care of young trees is important to its success. Studies demonstrate that the first five years of a newly planted tree are critical to its long-term health. Trees in an urban environment suffer from multiple impacts: air pollution reduces a tree's ability to make food; compacted soils from development of roads and structures interfere with the uptake of nutrients and water; sidewalks, curbs, streets and buildings limit the space for trees to spread their roots and branches. To preserve a tree's health and vitality, and to sustain its natural defense system, proper tree care, including preventative care, is crucial.

- A. **Urban Forestry Best Management Practices.** The following standards shall be followed to support and maintain tree health and vitality (see the Technical Manual for Landscape Design):
1. Provide regular, deep watering for good health and disease prevention, and to prevent surface roots.
 2. Trees shall be planted with water basins. Rebuild water basins as needed.
 3. Prevent damage to bark from string trimmers and mowers by using expandable tree guards at the tree base.
 4. Weed frequently to prevent loss of nutrients to the tree roots.
 5. Use mulch to conserve moisture and suppress weeds (Detail P-9).
 6. Stake a newly planted tree until the tree can stand by itself. See Detail P-3.
 7. Ensure that automatic irrigation to tree is in good working condition. Check bubbler/irrigation line frequently and clean nozzles as needed.
 8. Do not prune or fertilize young trees for the first two years (except for the removal of suckers and water spouts).

9. Check for disease, damage or pests and treat accordingly.
 10. Root barriers shall be installed in accordance with Perris Landscape Manual Specifications (Detail P-7 or P-10).
 11. Every two to three years, it is recommended that up to four holes one to two inches in diameter can be drilled or water-jetted at an angle down and outward from near the base of the tree to allow for better penetration of oxygen and water.
- B. Planting.** Trees shall be planted in accordance with the Technical Manual for Landscape Design (Detail P-3 for trees, Detail P-1 for palms). Care shall be taken to avoid planting trees too deep, which causes the base of tree trunks to swell unnecessarily.
- C. Pest Control.** When insect and/or disease infestations become a detriment to the tree, controls shall be used as described below. Pest control is based on the timing and intensity of the insect infestation.
1. When pest control is recommended, natural or biological substances shall be considered first, with chemical pesticides used only when warranted.
 2. Annual tree inspections should be timed to coincide with the time of year and weather conditions that have favored the development of insect problems in past years.
 3. If requests are received from residents, an inspection is conducted and recommendations are made based on the timing and effectiveness of the control.
 4. Not all problems are predictable and treatable, which results in the need for tree removal to prevent spread of the disease or infestation.
- D. Irrigation.** Irrigation shall be provided as appropriate for tree species and location. No tree shall be planted on City property without automatic irrigation and controls. Highly drought-tolerant trees, or trees newly planted in irrigated turf areas may have temporary irrigation systems as approved by the City's Landscape Architect for a minimum of two (2) years. Tolerance for recycled water as provided by EMWD shall be assured.
- E. Pruning Specifications.** A popular axiom states: prune first for safety, next for health, and finally for aesthetics. The specifications below are based on International Society of Arboriculture (ISA), National Arborist Association, and American National Standards Institute (ANSI) criteria to ensure that the City's urban forest receives the best possible care. The following trimming specifications are recommended for the pruning of City trees:
1. Lightly trim all trees to lighten and balance the trees, removing no more than 15-20% of the tree.
 2. Remove diseased branches, dead wood, crossed branches, suckers and water spouts.

3. Encourage radial distribution of all branches to provide sufficient number of scaffold branches to fill the circular spaces as concentrically as possible around the trunk.
4. Final trimming cuts shall be made without leaving a stub. Cuts shall be made just outside the shoulder ring area. Extremely flush cuts, which produce large wounds and weaken the tree at the cut, shall be prohibited.
5. All trimming shall provide adequate clearance for any obstructed street sign, streetlight, or other approved standard.
6. Over sidewalks, limbs shall be raised a minimum of seven and a maximum of eight feet from grade to wood. Where sidewalks do not occur or are located on the street side of a parkway, limbs may be retained below the minimum elevation to conform to the natural shape of the species.
7. Over residential streets, limbs shall be raised gradually from 10 feet at curb to 14 feet over traffic lanes from grade to wood giving the appearance of an arch rather than an angle.
8. Over arterial streets, including major arterials, limbs should be raised a minimum of 12 and a maximum of 16 feet from grade to wood.
9. Over the sidewalk or the street, where the lowest limb is attached to a trunk above the desired elevation but extends below that elevation, it shall be cut back to a large lateral near the desired elevation, if possible, rather than entirely removed to avoid damage to the trunk.
10. Trimming shall not exceed the amount necessary to achieve the specified elevation at the time of raising. No attempt to trim to a higher elevation to allow for future growth shall be permitted.
11. On young trees, "temporary" branches may be retained along the stem to encourage taper, and to protect trees from vandalism and sun scald. Less vigorous shoots should be selected as temporary branches and occur four to six inches apart along the stem. These temporary branches should be pruned annually to slow their growth and eventually removed.
12. No limb over three inches in diameter will be removed without the City Arborist's recommendation.

F. Unacceptable Pruning Practices. Harmful pruning practices are still encountered in the marketplace and should be avoided to maintain the health and beauty of the urban forest. The topping of trees to control height and width are a common example. These methods result in the development of undesirable epicormic sprouts (such as water sprouts and suckers), or in the death of the cut branch back to the next lateral branch below. **Crown reduction pruning** is a preferred method to reduce the size or height of the crown of a tree, but is rarely needed and should be used infrequently. Improper pruning cuts cause unnecessary injury and bark ripping that leads to decay and disease. The following undesirable pruning practices shall be avoided:

1. **Flush cuts** injure stem tissues and can result in decay.

2. **Stub cuts** delay wound closure and can provide entry to canker fungi that kill the cambium, and delay or prevent woundwood formation.
3. **Lion-tailing** removes inside lateral branches and inner foliage, resulting in weight displacement to the ends of the branches, sunburned branches, water sprouts, weakened branch structure and limb breakage.
4. **Hat racking** is to prune a tree of all but its largest branches.
5. **Pollarding** severely prunes trees back nearly to the trunk, so as to produce a dense mass of branches.

G. Safety Tree Pruning Specifications. Safety tree pruning shall consist of the total removal of dead or living branches that may menace the future health, strength and attractiveness of trees. Trees shall be pruned according to the Tree Pruning Specifications in Section F above, and ANSI Standard Z-133.

H. General Requirements.

1. Proper disposal of all tree debris generated.
2. Assure safe traffic control and minimum disruption to the public.
3. Assure adequate safety of employees and the public.
4. Contractors performing tree work in the City shall have appropriate licenses and sufficient liability insurance before performing tree services.

I. Tree Root Protection. Roots are a tree's life support system. Underground, approximately 85% of a tree's roots are in the top 18" of soil. When trenching and digging near mature trees is necessary, the following practices are encouraged to minimize damage to tree roots:

1. **The most direct route may not be the best route.** If possible, alter the trenching route to cause the least amount of root damage.
2. **When roots must be cut, make sharp cuts.** If roots 2" or larger must be cut, use a shovel to expose the root and cut with a sharp saw. Crushed or torn roots should be neatly trimmed to prevent decay. Clean root cuts generate new roots.
3. **Work to the far side of the trench.** Trenching should be done as far away from the trunk as possible, preferably outside the dripline. Pile soil from the trench on the side away from the tree, if possible, or place soil on plywood or a tarp or a thick pile of mulch to prevent digging into the soil above the roots when backfilling the trench by backhoe.
4. **Keep root ends moist.** Refill the trench hole as quickly as possible to prevent roots from drying out. In hot, windy or dry conditions large roots may die within an hour or less. Use sprinklers, misting or wet burlap to protect vulnerable roots.

19.71.070 TREE SELECTION

The choice of a tree for a public place is an important long-term consideration. Selecting the best tree species for the intended purpose and location can prevent damage to buildings or infrastructure, and prevent severe pruning or the removal of healthy mature trees and the associated costs. The ideal public tree is not susceptible to wind damage and branch drop, does not require frequent pruning, produces little litter, is deep-rooted, has few serious pest and disease problems, and tolerates a range of soil conditions, irrigation regimes, and air pollutants. Because very few trees have all these traits, it is important to match the tree species to planting site by determining what issues are most important on a case-by-case basis. Tree selection should consider the following factors:

- A. Diversity of species.** Provide a diversity of tree species to support the health of the ecosystem.
- B. Aesthetics and function.** Ensure that tree choices are appropriate to the intended use or effect (aesthetics, shade, and screening).
- C. Size.** Consider maximum tree height, width and root zone, and proximity to adjacent structures (including pavement) to avoid planting in too small an area.
- D. Avoid Utility Conflicts.** Choose a tree of appropriate size for the location, and:
 - 1. Contact utility companies before planting to locate underground water, sewer, gas, and telecommunication lines. Keep trees away from overhead power lines and do not plant within 10 feet of underground water and sewer lines.
 - 2. Landscape plans shall indicate the location of power lines, streetlights, and traffic signs, and select tree species that will not conflict with them. Keep trees at least 30 feet away from street intersections to ensure visibility.
 - 3. Avoid locating trees where they can block illumination from street lights or views of street signs in parking lots, commercial areas and along streets.
 - 4. Avoid planting shallow rooting species near sidewalks, curbs, and paving.
 - 5. Avoid locating trees where they can block sunlight from solar panels.
- E. Location.** In addition to providing ample planting area that allows water, air and nutrients to reach the roots, the following locations require careful consideration regarding tree choice:
 - 1. **Parking Lots.** Trees within parking lots should be clean (no excessive shedding of leaves, bark, flowers or seeds), and be able to withstand heat and vehicle exhaust fumes. A mix of low maintenance flowering, deciduous and evergreen trees should be considered to provide color, texture and shade throughout the year. The canopy of parking lot trees should provide a minimum of 50% shade within five (5) years of planting. See Subsection F below regarding energy conservation and shade benefits of location.

2. **Medians and Parkways (Street Trees).** Buildings are softened and streetscapes beautified by trees and other plants in parkways and medians. Street trees shall comply with the provisions of Sections 19.70.040.A and B, and project Conditions of Approval. A list of approved street trees is found in Section 19.70.040, Technical Manual for Landscape Design.
3. **Recreational Facilities.** Trees for parks and other recreational facilities should be carefully chosen for size, shade ability, durability and beauty. Park trees can have different characteristics than trees in parking lots and along City streets.
4. **Residential Street Trees.** Tree-lined residential streets are an asset to every community. Street trees in residential neighborhoods are located in parkways (between the curb and the sidewalk) or in the landscape setback area that includes the utility easement between the sidewalk and private property lines. This area may be connected to the homeowner's front lawn or landscaped area. Generally, the street tree is the tree closest to the sidewalk or curb. The size of the street tree should be matched to the width of the parkway or landscape easement:

<u>Planter Width</u>	<u>Tree Size</u>
4-6'	Small
6-8'	Medium
8' or more	Large

F. Energy Savings. Trees in the right location reduce energy costs by permitting or restricting heat gain to the building, thereby lessening the amount of power required to operate the air conditioning or heating system of the building.

1. **Recommendations for Residential Energy Conservation.** Well placed trees on residential lots save energy costs by reducing heat gain through the shade they provide. For optimal benefit, plant trees as indicated below:
 - a. Shade trees on the west and southwest sides of homes provide the greatest energy benefit.
 - b. Plant deciduous trees on the south side of homes to allow winter sunlight and heat gain.
 - c. Plant shade trees to cool paved areas.
 - d. Shade air conditioning units to reduce the energy consumption. Vegetation should not obstruct air flow around the unit.
2. **Commercial and Industrial Recommendations.** Trees planted in commercial and industrial properties are valuable components of the community's urban forest. Building owners can reduce building energy costs and lessen the heat island effect by taking advantage of the shade potential of properly located trees.
 - a. **Energy conservation.** Plant non-deciduous (evergreen) trees on the west and south sides of buildings for shade to reduce the interior air-conditioning load, and deciduous trees on north and east sides of buildings to conserve energy through heat gain in winter.

- b. **Shade benefits.** Non-deciduous shade trees planted adjacent to hardscape will lessen the heat island effect. Parking area landscaping shall comply with requirements of PMC 19.70.040.F.
- c. **Street landscape design** and choice of street tree should be consistent and complementary to adjacent development along primary arterials.
- d. **Accent landscaping.** Mature specimen trees (36” box or larger), or groups of trees should be used as focal points at driveway entrances, street intersections, and where monumentation will highlight a development.

19.71.080 PERMIT REQUIREMENTS

- A. **Existing Regulations.** PMC Section 12, *Excavations and Encroachments*, describes the City tree removal process:

12.12.030 Tree removal permit –

No person, firm, corporation, public agency or political subdivision shall remove or severely trim any tree planted in the right-of-way of any city street or on city property without first obtaining a permit from the Director of Public Works to do so. Such permit shall be issued after payment of the fee provided in this chapter, if the Director of Public Works is satisfied that such removal or trimming is in the public interest or is necessary for the improvement of the street or right-of-way or the construction of improvements on adjacent land. He/she may impose such conditions as he deems reasonable or necessary, including requirements for the work to be done only by a qualified tree surgeon or tree trimmer actually engaged in the business, and for bond, insurance or other security to protect persons and property from injury or damage. The provisions limiting trimming of trees shall not apply to any public utility maintaining overhead power or communication lines pursuant to franchise, where necessary to prevent interference of a tree with such installation. A permit for removal of a tree may be conditioned upon its relocation or replacement by one or more other trees of a kind or type to be specified in the permit. (Ord. 308 § 3, 1967).

12.16.010 Violation. Penalty –

A violation of this title is an infraction and punishable as provided in PMC Section 1.16.010.

19.71.090 OFFENSES AND ENFORCEMENT MEASURES

- A. **Offenses.** In addition to the provisions of Title 12 of the Perris Municipal Code, it shall be unlawful for any person other than a City employee or authorized contractor to:
 - 1. Harm, destroy or remove any tree or shrub located on public land.

2. Excavate any tunnel, ditch, or trench, or to lay any driveway, sidewalk, or pavement through or across the root zone of any such tree or shrub, except in accordance with the standards contained in 19.71.060.I, Tree Root Protection;
 3. Attach any wire, rope, cable, poster, sign, or other fastener to such tree or shrub in such a way to cause damage. Nailing or other means of penetrating the cambium is prohibited;
 4. Place, deposit, or store any stone, brick, sand, earth, or other material so as to impede the passage of water, air, and fertilizer to the roots of any such tree or shrub, except in accordance with adopted standards;
 5. Unreasonably prevent, delay, or interfere with the City Arborist, landscape architect or any designee engaging in or about the planting, maintenance, or removal of any tree or shrub on public or City-controlled land.
- B. Damage or Removal of Protected Trees.** No person shall harm, destroy or remove any tree in the Protected Tree category, including Heritage Trees, Specimen Trees, or Special Status Trees.
- C. Requirements for Private Landowners.** Private landowners shall follow applicable ordinance requirements, including the obligation to file tree location and assessment plans with development applications, and providing tree protection plans, landscape plans, replanting plans, and/or other plans as required by the Urban Forestry Board or the Director of Development Services or designee in relation to land-disturbing activities.
- D. Enforcement Procedures.** When brought to the attention of the Urban Forestry team (Urban Forestry Board, Development Services Director, Public Works Director, City Arborist or Landscape Architect) that a violation of this section may exist, an infraction is punishable as provided in Section 1.16.010, or as required by PMC Section 1.18, *Administrative Citations*. In addition, the City may take the following actions:
1. Issue a stop work order pursuant to PMC Section 7.40.090;
 2. Issue an administrative citation pursuant to PMC Section 1.18.010;
 3. Take any other action allowed by law to abate or obtain compensation for the violation. (Ord. 02-34)
- E. Appeals.** Appeals of arbitration, decisions or other actions by the Urban Forestry Board shall be made to the City Council by filing a written appeal with the City Clerk, with the appropriate filing fee, in accordance with PMC Section 19.56.070.

19.71.100 NUISANCE AND HAZARD DETERMINATIONS; REMOVAL PROCESS

The loss of a mature canopy tree shall be avoided if possible. However, trees in poor condition, causing damage, conflicting with utilities, or presenting a threat to the public that cannot be resolved through appropriate pruning are not candidates for preservation.

A. **Nuisance Tree Classifications.** At the request of the Public Works Director or Urban Forestry Board, nuisance trees on public or City-controlled land shall be designated by the City Arborist in accordance to their nuisance potential as classified below, and the economic evaluation in Subsection B, and with consideration of retention policies in Subsection C:

1. **Public Safety.** No tree shall present a threat to the public safety.
2. **Obstruction.** Trees obstructing sidewalks, roadways and traffic line of sight.
3. **Overhead Utilities.** Trees that cannot be pruned properly to avoid entanglement with overhead utilities.
4. **Pest, Disease, or Neglect Damage.** Trees that may be damaged to the extent that a hazard is present to the public or, in the case of disease, the tree may have the potential to infect other healthy trees in the vicinity.

B. **Economic Criteria for Removal of Nuisance Trees.** A tree considered for nuisance removal must meet a minimum of four of the six criteria listed below before a recommendation for removal can be made to the Director of Public Works. Criteria "1" shall be included as one of the four.

1. The cost of damage by the tree exceeds 1/2 of the value of the tree. Dollar values for trees are found in the International Society of Arboriculture tree replacement book. Example: A tree valued at \$8,000 must have caused at least \$4,000 in damages.
2. Repeated paid claims against the City due to damage caused by the tree.
3. A request for removal that authorized staff concurs is a legitimate request.
4. Recurring problems related to the tree within a 10-year period, i.e., the tree has lifted or broken the sidewalk or curb more than once within 10 years.
5. Comparable problems or concerns in the surrounding area would not lead to removal of all the trees in that area.
6. The tree may contribute to or lead to a potentially hazardous condition if not removed, i.e., lifted sidewalk, leaning toward the house, unbalanced tree, obstructed view of traffic, etc.

C. **Nuisance Tree Policies.** Prior to a decision to remove a non-hazardous tree, consideration of the following shall be given to retain trees:

1. Root pruning of trees and/or installation of root barriers where it is deemed appropriate and in the best interest of the tree as determined by the Urban Forestry Board or designee. Oaks, beeches and redbuds are among the species that do not tolerate root damage.
2. Adjusting the location of the sidewalk and/or any utilities.

3. Narrowing the sidewalk to avoid the tree or adding a patch of concrete or asphalt fill where the sidewalk is raised.
4. When street improvements mandate that palms or trees with a DBH of 6” or larger be removed, every reasonable effort shall be made to relocate said trees, provided that the species is adaptable to replanting.

D. **Removal Requirements for Non-Hazardous Trees.** All non-hazard tree removals will be assessed by the City Arborist in consultation with the Public Works Director, and reported to the Urban Forestry Board.

1. **Residential Street Trees.** For multiple requests from the same street, each tree will be assessed individually, with no more than 30% of any one block allowed to be removed within a one-year period. The Urban Forestry Board will track removals to avoid excessive removals from any one neighborhood.
2. **Programmed Tree Removals.** A program for the removal of undesirable trees may be developed by the Director of Public Works or designee, in consultation with the City Arborist, based on the severity of overall deficiencies including width of parkway, species, tree condition, or extent and number of recurrences of chronic structural damage to improvements. Programmed removals may be approved by the Urban Forestry Board to allow a multiple year schedule for the removal of alternate/intermittent trees, so as not to remove all trees at one time.

E. **Condemnation and Removal Process for Hazardous Trees.** The decision to remove a hazardous tree will be based on the recommendation of the City Arborist and supported by an Arborist’s report, unless an emergency situation requires the Public Works Director to take immediate action to protect the public safety. The Public Works Director shall report all hazardous tree removals to the Urban Forestry Board.

F. **Definition of Hazardous Tree.** A tree that is dying, dead or structurally weak; a traffic obstruction; or a tree deemed injurious to the health, safety, or welfare of the general public.

G. **Types of Hazardous Trees.** In addition to trees severely damaged by disease, pests, vehicular collision, or other reason, some tree species are inherently hazardous. Care should be exercised when these species are chosen for landscaping:

1. **Breakage hazard.** California Pepper, Brazilian Pepper and some species of Eucalyptus are known to have more brittle limbs than other tree varieties, and should only be used in large open areas such as water quality basins and parks where any breakage will have less potential to cause bodily or property damage.
2. **Fire risk due to chemical composition.** Some trees present a higher fire danger due to natural resins in wood and leaves that burn intensely. Trees in this category should be planted furthest from structures. Some examples are listed below:

Cupressus sempervirens: Italian Cypress
Eucalyptus species
Juniperus deppeana: Alligator Juniper
Juniperus monosperma: One-Seed Juniper
Pinyon Pine, Pinus: Pine species

- H. **Removal of a Heritage Tree or Other Protected Tree.** An application shall be approved by the Public Works Director, whose decision may be appealed to the Urban Forestry Board prior to removal. If an application to remove a Heritage Tree is presented, it shall be supported by a certified Arborist's Report demonstrating that the tree is dead or hazardous. Mitigation for the loss of the tree shall be provided as outlined in Subsection I, below.
- I. **Mitigation for Tree Removal is Tree Replanting.** After removal of a hazardous or nuisance tree, to the extent feasible, a new tree shall be planted within 45 days (except during summer months) to replace the tree removed. This includes trees damaged and removed by the Public Works tree crew as a result of vehicular collision. In all instances, consideration and avoidance of the issues that may have contributed to the tree's removal shall be included in the process.

(Ord 1262 10/27/09)