

Zoning and Development Code Amendment Landscaping and Screening Amendments

DATE OF REVIEW: January 15, 2025

CODE REFERENCES: Section 8-10 Landscaping; Section 8-40 Screening

STAFF REVIEW AND ANALYSIS:

Background:

In response to a directive from City Council to focus on water conservation, the Public Works and Planning and Development Services departments partnered on an initiative to research and propose opportunities for development code revisions that would increase water conservation by decreasing irrigation consumption for Code required landscape areas. After researching landscape codes from other municipalities, xeriscaping options, types of turfgrass and ground preparation, and considering the financial impacts of such amendments to the development community, staff identified potential revisions to the Code that will serve to reduce utilization and preserve water in the city.

Additionally, other deficiencies were identified by staff in the landscape and screening code because they were not prescriptive enough to result in landscaping that served the intended purpose, or they were requiring landscaping that did not provide value to the community. Finally, with the prevalence of smaller residential lots, staff have observed the current tree requirement for individual residential lots to be problematic because it results in too many large trees in a small area without room to grow, which will ultimately result in conflicts between the trees and other structures. Revisions have been included with this amendment to resolve those issues.

Proposed Revisions:

Reducing Non-functional Turfgrass

Turfgrass varieties commonly installed on both residential and non-residential sites have high water needs and, during the many dry months we have in central Texas, require irrigation to survive. In addition, many areas of turfgrass on non-residential sites are nonfunctional which means they are decorative and not utilized for civic, community, or recreational purposes. Some of these turfgrass areas are very small, such as grass strips between sidewalks and streets, and difficult to irrigate without wasteful overspray. There are new seed blends which include native buffalo grass varieties (Habiturf, Native Sun Turf, and Thunder Turf) that are deeper rooting and more drought tolerant than the more commonly installed varieties but have a similar aesthetic. There is also scientific data that links deeper prepared soil depth to the increased water uptake and viability of landscape plantings.

Staff's goal is to provide options for the development community while reducing large areas of nonfunctional turf and promoting the more drought tolerant turfgrass varieties which require less water. Therefore, we have proposed code revisions that prohibit turfgrass installation in the small strips between sidewalks and street rights of way, increased the minimum improved soil depth for turf areas from four to six inches, and provided developers with the option to either limit turfgrass areas to no more than 50% of the areas not covered by impervious surface or to have no limitation on the amount of turfgrass where the native seed blends

Zoning and Development Code Amendment Landscaping and Screening Amendments

referenced above are specified and installed.

Staff anticipate these revisions will result in measurable water conservation in the city and significant irrigation costs savings to developers and end users which offset the increased initial costs to the development community that are incurred due to the proposed changes.

Screening

The landscape and screening codes currently require the planting of shrubs for screening of parking lots and ground level utilities; however, there are no criteria for those shrubs. The intent of parking lot landscape buffers is to provide a screen between parking areas and drive aisles and the street to a height of three (3) feet, which is the average height of vehicle headlights. The intent of screening for ground level utilities is to hide the appearance of unsightly utility boxes, transformers, and HVAC units by providing a visual screen.

Staff have observed the plant material commonly provided in these instances is deciduous which would not provide year-round screening and/or of a species that will not grow to 3 feet in height. Therefore, we have proposed a code change that would require such material to be evergreen and installed at a minimum height of two (2) feet to ensure it achieves the purpose of providing a year-round visual screen within a reasonable time period from installation.

The screening code currently requires dumpster and trash handling areas to be screened with a masonry enclosure and opaque gate. The masonry must be stone, brick, or split or stone face CMU. There is a secondary requirement to provide landscaping around the sides and rear of the enclosure; however, staff believe this standard is unnecessary due to the requirement that the enclosure material be decorative and that fact that we do not require planting at the base of other decorative masonry walls. So, we have proposed to remove landscape requirement at the base of the enclosure from the Code.

Tree Requirements for Residential Lots

Finally, the existing landscape code includes two categories of tree requirements for single family lots. The first applies to lot widths up to eighty (80 feet) and the second applies to lot widths greater than eighty (80) feet wide. These lot widths are outdated because the development pattern in Round Rock has trended toward smaller lots. For example, the SF-3 (Single-family Mixed Lot) zoning district supports smaller lots and includes a mix of lot sizes, all of which have minimum lot widths less than 80 feet wide.

Staff have found the current tree requirement for lot widths greater than 80 feet wide is rarely applied due to the prevalence of smaller lots and having the same tree requirement for lots up to 80 feet wide is problematic because it results in too many trees planted too close together on the smaller lots. The proposed code revision enacts three categories of tree requirements based on what is reasonable for the various lot widths, accounting for the reduction in planting area due to the driveway, and appropriate tree spacing requirements.

RECOMMENDED MOTION:

Staff recommend approval of the code amendments.

1 **CHAPTER 1. INTRODUCTORY PROVISIONS**

2 Sec. 1-50. - Definitions.

3 The purpose of this section is to define words, terms and phrases contained within this code, unless
4 otherwise specifically defined elsewhere herein. Definitions for words not defined below may be defined
5 elsewhere in the City of Round Rock Code of Ordinances or found in Webster's Dictionary of the English
6 language, unabridged, subject to interpretation by the PDS director.

7

Term	Definition
Drought-tolerant turf grasses	Turf grass varieties and mixes that have been developed to minimize, once established, the requirements for irrigation, mowing, weeding and fertilizer in central Texas landscapes and have summer-dormancy capabilities. Drought-tolerant turf grasses include species such as Buffalo, Bermuda hybrids that do not produce viable seed, Zoysia, Native Sun Turf™, Thunder Turf™ and HABITURF®. St. Augustine is not considered a drought-tolerant turf grass

8

9

II.

10 That Zoning and Development Code, Chapter 8, Article II, Section 8-10, Code of
11 Ordinances (2018 Edition), City of Round Rock, Texas, is hereby amended as follows:

12 Sec. 8-10. - Landscaping.

13 (a) *Purpose.*

14 (1) The physical appearance of the built environment is an important component of the character,
15 value, and human experience of a community. Landscape treatment and site design function to
16 integrate natural elements into these manmade systems, particularly architectural features and
17 transportation infrastructure. The intent is to make Round Rock a more sustainable and attractive
18 place in which to live, visit and do business.

19 (2) Regulations must serve to provide attractive, functional and efficient landscaping, the cost of
20 which is justified by the enhancement of property values and the creation of a sense of place
21 through the cumulative impact of development.

22 (b) *Intent.*

23 (1) To ensure that all planting requirements serve not only to benefit the community aesthetically,
24 but also contribute functionally whenever opportunities to do so are presented.

25 (2) To utilize planting and landscape elements to mitigate the negative impacts of development by
26 screening unsightly features, reducing the heat island effect, and buffering incompatible uses.

27 (3) To provide incentives for creative subdivision and site design.

- 1 (4) To implement site design and planting requirements which minimize the need for maintenance
2 and utilize sound water conservation practices.
- 3 (5) To provide for landscaping regulations that encourage the preservation of protected trees, as
4 defined in Sec. 1-50.
- 5 (6) To establish monarch trees as focal points that should be highlighted by proposed development.
- 6 (c) *Applicability.* This section shall apply to all land area (public and private) within the zoning jurisdiction
7 of the city and in areas where this section is in effect by contractual agreement.
- 8 (1) *Application of landscape requirements.* The requirements of this section shall apply to:
- 9 a. All new development or construction on vacant or previously developed land, that requires
10 site plan approval;
- 11 b. All new single-family or two-family residences in the SF-2 (Single-Family - Standard Lot),
12 SF-3 (Single-Family - Mixed Lot), and TF (Two-Family) zoning districts. Such requirements
13 may be found in subsection (l) below;
- 14 c. Any change of land use which results in redevelopment of a residential use to a
15 nonresidential use;
- 16 d. Any change, conversion, or addition of commercial land uses that result in the requirement
17 for additional parking to be constructed. In this case, the landscape requirements shall apply
18 to only the newly proposed parking area and other areas of the site being modified by
19 development activities; and
- 20 e. Detention ponds and water quality ponds that are part of any development including
21 residential subdivisions. Common development that encompasses more than one lot shall
22 be treated as one for the purposes of application of this section. Split ownership, planning in
23 phases, construction in stages, or multiple building permits for a project shall not prevent it
24 from being considered a common development, provided that a comprehensive site plan is
25 submitted for all portions of the development being considered as a common development.
- 26 (2) *Exemption from landscape requirements.* The requirements of this section specifically shall not
27 apply to the following:
- 28 a. New construction of detached single-family homes in the SF-R (Single-Family - Rural), SF-
29 1 (Single-Family - Large Lot), and SF-D (Single-Family - Downtown) zoning districts;
- 30 b. Expansions or modifications to an existing detached single-family residence in any zoning
31 district;
- 32 c. Restoration of a building or structure which has been damaged, destroyed or demolished to
33 an extent less than 50 percent of its fair market value (as determined by the most recent
34 appraised value of the appraisal district in which the building or structure is located);
- 35 d. Exterior or interior restoration of a designated historic structure;
- 36 e. Medians in street rights-of-way;
- 37 f. Ground-mounted equipment located in street rights-of-way.
- 38 (d) *Landscape plans.* The submittal of landscape plans shall not be required for new homes in the SF-2,
39 SF-3, and TF zoning districts, but shall be required with the following:

- 1 (1) *Standard site plan.* Landscape requirements identified in this section and in the format specified
2 by the development packet necessary to obtain a standard site plan approval shall be depicted
3 on a landscape plan. This landscape plan shall be signed and sealed by a landscape architect.
- 4 (2) *Small project site plan.* Landscape requirements identified in this section and in the format
5 specified by the development packet necessary to obtain a small project site plan approval shall
6 be depicted on a site or landscape plan. If the plan includes 10 or more trees, the plan shall be
7 signed and sealed by a landscape architect. If the plan includes less than 10 trees, the plan shall
8 be signed and sealed by a landscape architect, professional engineer, landscape design
9 professional, licensed nurseryman, or urban forester.
- 10 (e) *General planting requirements.*
- 11 (1) **Trees**
- 12 a. The planting specifications and standards included in the Tree Technical Manual are
13 applicable unless otherwise stated herein.
- 14 b. At the time of planting, all trees shall have the following caliper measurements:
- 15 1. Large trees: three (3) inches;
16 2. Medium trees: two (2) inches;
17 3. Small/ornamental trees: one (1) inch.
- 18 c. Tree planting pits shall be 50% excavated soil and 50% prepared soil.
- 19 d. (2)—All trees shall be planted in a pervious area no less than four (4) feet wide in any
20 direction measured from the center of the tree, unless otherwise stated herein. Said
21 pervious area shall be covered with mulch to a minimum average thickness of three (3)
22 inches, except for the area within a six (6) inch radius of the tree trunk which shall have
23 no mulch or other material above the root ball in order to prevent or reduce the possibility
24 of bark rot.
- 25 e. Notwithstanding the requirements of the Tree Technical Manual, the zoning administrator
26 may allow large trees to be placed closer to a building in order to achieve an urban
27 streetscape.
- 28 f. All trees planted to meet the landscaping standards herein shall be protected trees regardless
29 of size.
- 30 g. Berms shall not encroach upon the critical root zones of existing trees, as regulated by
31 chapter 8, Article III, Tree Protection and Preservation.
- 32 (2) Shrubs provided to satisfy requirements for parking lot landscape buffers and screening
33 requirements of Section 8-40 shall be evergreen and have a minimum height of 24" at time
34 of planting.
- 35 (3) **Species Diversity.** No more than 50 percent of the required trees and shrubs shall be of the same
36 species without the approval of the zoning administrator. Such approval may only be granted in
37 order to achieve a specific design intent of the landscape architect.
- 38 (4) **Turfgrass**
- 39 a. Wherever sod or turfgrass is specified, such grass shall be of a drought-tolerant species.
- 40 b. Drought tolerant turf grass shall be limited to 50% of the lot area that is not covered by
41 impervious cover.

1 c. Where Habiturf®, Native Sun Turf™, or Thunder Turf™ are specified, the 50% coverage
2 limitation shall not apply.

3 d. Turfgrass shall not be installed between sidewalks and back of curb adjacent to street rights
4 of way.

5 (45) **Soil Depth.** Improved soils containing a minimum 20% organic content shall be provided in all
6 required landscape areas in accordance with the following:

7 a. Turf areas shall have ~~to~~ a minimum improved soil depth of ~~four~~six (64) inches;

8 b. Planting beds shall have ~~to~~ a minimum depth of eight (8) inches; ~~and~~

9 c. ~~Tree planting pits shall be 50% excavated soil and 50% prepared soil.~~

10 (56) **Landscape Barriers and Edging**

11 a. All landscaping shall be separated from vehicular use areas by some form of barrier such as
12 raised concrete curbing, bollards, curb stops, or other suitable permanent alternative.

13 b. ~~(6)~~—All landscape beds shall be separated from ~~turfgrass~~sod areas by some form of barrier
14 such as steel edging, masonry materials, or another equivalent durable material as approved
15 by the zoning administrator. No plastic materials shall be allowed. Provided however, the
16 barriers may be designed in such a way to capture, filter, reuse or infiltrate rainwater with the
17 purpose of protecting and conserving water resources.

18 (7) **Visibility**

19 a. Landscaping shall not obstruct the view between access drives and parking aisles.

20 b. ~~(8)~~—Nothing shall be erected, placed, allowed to grow, or planted so that it impedes vision
21 between the height of three (3) feet and 10 feet above the curb within a sight visibility triangle,
22 as defined in Sec. 1-50.

23 (98) No artificial plant material may be used in any form to satisfy the requirements of this section.

24 ~~(10) Berms shall not encroach upon the critical root zones of existing trees, as regulated by chapter~~
25 ~~8, Article III, Tree Protection and Preservation.~~

26 ~~(11) Wherever sod or turf grass is used, such grass shall be of a drought-tolerant species.~~

27 ~~(12109)~~ —Any landscaping placed in utility easements shall not be counted towards the minimum
28 landscaping requirements.

29 ~~(13) Notwithstanding the requirements of the Tree Technical Manual, the zoning administrator may~~
30 ~~allow large trees to be placed closer to a building in order to achieve an urban streetscape.~~

31 ~~(14) At the time of planting, all trees shall have the following caliper measurements:~~

32 a. ~~Large trees: three (3) inches;~~

33 b. ~~Medium trees: two (2) inches;~~

34 c. ~~Small/ornamental trees: one (1) inch.~~

35 ~~(15) All trees planted to meet the landscaping standards herein shall be protected trees regardless~~
36 ~~of size.~~

37

- 1 (f) *Interior parking lot landscape requirements by zoning district.*
- 2 (1) *TH (Townhouse), SR (Senior), MF-1 (Multifamily - Low Density), MF-2 (Multifamily - Medium*
3 *Density), MF-3 (Multifamily - Urban), C-1 (General Commercial), C-1a (General Commercial -*
4 *Limited), C-2 (Local Commercial), OF-1 (General Office), OF-2 (Mid-Rise Office), BP (Business*
5 *Park), PF-1 (Public Facilities - Low Intensity), PF-2 (Public Facilities - Medium Intensity), PF-3*
6 *(Public Facilities - High Intensity), MU-R (Mixed-Use - Redevelopment and Small Lot), and MU-*
7 *G (Mixed-Use Greenfield and Large Lot) zoning districts.*
- 8 a. Large trees shall be provided in parking areas. The construction of off-street parking areas
9 requires the planting of one large tree in each island so that there are no more than 10
10 contiguous parking spaces between islands, except as otherwise provided herein.
- 11 b. End islands shall be provided at the terminus of each parking bay. Interrupting islands shall
12 be provided within each parking bay as required herein. End islands and interrupting islands
13 shall have a minimum width of nine (9) feet from face of curb to face of curb and shall contain
14 a large tree. Head-to-head parking bays shall include two (2) such end islands.
- 15 c. In a row of parking immediately adjacent to a perimeter parking lot landscape area, required
16 interrupting islands may be eliminated by planting two (2) additional large trees in the
17 adjacent landscape area for each interrupting island so eliminated.
- 18 d. A median island with a minimum width of nine (9) feet, from face of curb to face of curb, shall
19 be required between every six (6) single parking bays and along primary internal and
20 external access drives. Medium or large trees shall be planted at a rate of one per each 50
21 linear feet or fraction thereof. Median island intervals may be expanded in order to preserve
22 existing trees, provided an alternative median location has been approved by the zoning
23 administrator.
- 24 e. Other plant materials may be substituted for a large tree between the building and the first
25 drive aisle as per the foundation landscape requirements provided in subsection (h) below.
26 Specifically, plant materials totaling 30 foundation treatment points as set out in the table in
27 subsection (h)(1)c. below, shall be provided in the required island for each large tree to be
28 substituted.
- 29 f. The preservation of existing healthy trees of a protected species, as set forth in the definition
30 of "protected tree" in Sec. 1-50, may be used as credits towards the landscaping required
31 by this subsection. These credits may not be used to replace an end island or median island
32 tree unless the preserved tree is located within the required end island or median island.
33 Each preserved tree is credited towards the adjacent 10, 20, or 30 parking spaces,
34 accordingly:
- 35 1. Each healthy large tree with a diameter of at least four (4) inches but less than eight (8)
36 inches within 10 feet of a parking area will be counted as a credit towards one required
37 parking lot tree.
- 38 2. Each healthy protected large tree with a diameter of eight (8) inches to 20 inches
39 preserved within 15 feet of a parking area will be counted as a credit towards two (2)
40 required parking lot trees.
- 41 3. Each healthy protected large tree with a diameter of more than 20 inches preserved
42 within 20 feet of a parking area will be counted as a credit towards three (3) required
43 parking lot trees.

- 1 g. The area within islands and medians shall not include sod or turf grass, and shall not include
2 more than 50 percent decorative groundcover material, unless approved by the zoning
3 administrator. The remainder of the area shall consist of planting groundcover.
- 4 h. Notwithstanding the requirements of the Tree Technical Manual, large trees required to meet
5 the tree island requirements may be planted closer than 30 feet from a building, but in no
6 event closer than 12 feet from a building.
- 7 (2) *LI (Light Industrial) and I (Industrial) zoning districts.*
- 8 a. End islands shall be provided at the terminus of each parking bay. End islands shall have a
9 minimum width of nine (9) feet from face of curb to face of curb. Head-to-head parking bays
10 shall include two (2) such end islands. A large tree shall be planted in each end island.
- 11 b. The area within islands and medians shall not include sod or turf grass, and shall not include
12 more than 50 percent decorative groundcover material, unless approved by the zoning
13 administrator. The remainder of the area shall consist of planting groundcover.
- 14 c. Notwithstanding the requirements of the Tree Technical Manual, large trees required to meet
15 the tree island requirements may be planted closer than 30 feet from a building, but in no
16 event closer than 12 feet from a building.
- 17 (g) *Parking lot landscape buffers by zoning district.*
- 18 (1) *TH (Townhouse), SR (Senior), MF-1 (Multifamily - Low Density), MF-2 (Multifamily - Medium*
19 *Density), MF-3 (Multifamily - Urban), C-1 (General commercial), C-1a (General commercial -*
20 *limited), C-2 (Local commercial), OF-1 (General Office), OF-2 (Mid-Rise Office), BP (Business*
21 *Park), LI (Light industrial), PF-1 (Public Facilities - Low Intensity), PF-2 (Public Facilities - Medium*
22 *Intensity), PF-3 (Public Facilities - High Intensity), and MU-G (Mixed-Use Greenfield and Large*
23 *Lot) zoning districts.*
- 24 a. Landscaping shall be provided between parking areas and all public streets in an eight-foot
25 (8') wide linear planting bed. The minimum landscaping required for this purpose shall be
26 based on the measured linear footage of parking including vehicular circulation routes that
27 extend along the length of the property line (excluding ingress/egress to the public road)
28 adjacent to the public right-of-way.
- 29 b. The required minimum quantity of landscaping is as follows:
- 30 1. One large tree or two small trees per 40 linear feet, or fraction thereof;
- 31 2. One small tree per 60 linear feet, or fraction thereof; and
- 32 3. One large shrub, small shrub, or ornamental grass per four (4) linear feet, or fraction
33 thereof. Any combination of large shrubs, small shrubs, and ornamental grasses is
34 acceptable.
- 35 c. There shall be no gap between required landscaping exceeding 25 percent of the length of
36 the landscaped area, unless approved by the zoning administrator.
- 37 d. Notwithstanding the requirements of the Tree Technical Manual, small trees may be grouped
38 no closer than 12 feet apart and large trees may be grouped no closer than 30 feet apart for
39 the purpose of meeting the requirements of this subsection (g).
- 40 e. If there are overhead utilities above the landscape area, then the required large and/or small
41 trees may be placed in additional interrupting islands within the first row of parking adjacent
42 to the public street. Such islands shall have a minimum width of nine (9) feet from face of

1 curb to face of curb. In addition, the owner shall have the option of reducing the eight-foot
2 (8') wide linear planting bed described in subsection (g)(1)a. above, to a four-foot (4') wide
3 area to accommodate only shrubs.

4 f. The area within islands and medians shall not include sod or turf grass, and shall not include
5 more than 50 percent decorative groundcover material, unless approved by the zoning
6 administrator. The remainder of the area shall consist of planting groundcover.

7 (2) *I (Industrial) zoning district.*

8 a. Landscaping shall be provided between parking areas and all public streets in an eight-foot
9 (8') wide linear planting bed. The minimum landscaping required for this purpose shall be
10 based on the measured linear footage of parking, including vehicular circulation routes that
11 extend along the length of the property line (excluding ingress/egress to the public road)
12 adjacent to the public right-of-way.

13 b. The required minimum quantity of landscaping is as follows:

14 1. One large or medium tree per 40 linear feet (75 percent of these trees shall be of a large
15 tree);

16 2. One small tree per 30 linear feet; and

17 3. One large shrub per eight linear feet.

18 c. Notwithstanding the requirements of the Tree Technical Manual, small trees may be grouped
19 no closer than 12 feet apart and large trees may be grouped no closer than 30 feet apart for
20 the purpose of meeting the requirements of this subsection (g).

21 d. If there are overhead utilities above the landscape area, then the required large trees may
22 be placed in additional interrupting islands within the first row of parking adjacent to the public
23 street. Such islands shall have a minimum width of nine (9) feet from face of curb to face of
24 curb. In addition, the owner shall [have] the option of reducing the eight-foot (8') wide linear
25 planting bed described in subsection (g)(2)a. above, to a four-foot (4') wide area to
26 accommodate only shrubs.

27 (3) *MU-1 (Mixed-Use Historic Commercial Core), MU-2 (Mixed-Use Downtown Medium Density)*
28 *and MU-R (Mixed-Use - Redevelopment and Small Lot) zoning districts.*

29 a. Landscaping shall be provided between parking areas and all public open space in an eight-
30 foot (8') wide linear planting bed. The minimum landscaping required for this purpose shall
31 be based on the measured linear footage of parking including vehicular circulation routes
32 that extend along the length of the property line adjacent to the public open space.

33 b. The required minimum quantity of landscaping is as follows:

34 1. One large tree or two (2) small trees per 40 linear feet, or fraction thereof;

35 2. One small tree per 60 linear feet, or fraction thereof; and

36 3. One large shrub, small shrub, or ornamental grass per four (4) linear feet, or fraction
37 thereof. Any combination of large shrubs, small shrubs, and ornamental grasses
38 acceptable.

39 c. There shall be no gap between required landscaping exceeding 25 percent of the length of
40 the landscaped area, unless approved by the zoning administrator.

1 d. Notwithstanding the requirements of the Tree Technical Manual, small trees may be grouped
2 no closer than 12 feet apart and large trees may be grouped no closer than 30 feet apart for
3 the purpose of meeting the requirements of this subsection (g).

4 e. The area within islands and medians shall not include sod or turf grass, and shall not include
5 more than 50 percent decorative groundcover material, unless approved by the zoning
6 administrator. The remainder of the area shall consist of planting groundcover.

7 (h) *Foundation treatment by zoning district.*

8 (1) *SR (Senior), C-1 (General commercial), C-1a (General commercial - limited), C-2 (Local*
9 *commercial), OF-1 (General Office), OF-2 (Mid-Rise Office), BP (Business Park), LI (Light*
10 *industrial), PF-1 (Public Facilities - Low Intensity), PF-2 (Public Facilities - Medium Intensity), PF-*
11 *3 (Public Facilities - High Intensity), and MU-G (Mixed-Use Greenfield and Large Lot) zoning*
12 *districts.*

13 a. The purpose of this subsection (h) is to outline requirements for the treatment of landscape
14 areas adjacent to buildings in the aforementioned zoning districts. The intent of this section
15 is to allow a variety of landscape treatments in order to achieve particular design goals, e.g.,
16 increased building visibility, view corridors to signage, and highlighting special architectural
17 features. Minimum requirements are determined based on the arrangement of parking in the
18 street yard and vary according to the site plan layout. A minimum number of foundation
19 treatment points (FTP) must be provided based on the site layout and the categories set
20 forth in subsection (h)(1)b. below. Notwithstanding the requirements of the Tree Technical
21 Manual, large trees required to meet the foundation treatment requirements may be planted
22 closer than 30 feet to a building, but in no event closer than 12 from a building.

23 b. Foundation treatment points (FTP) determination by category.

24 1. *Category 1:* Building with three (3) or more single parking bays in the street yard.

25 For Category 1 site plans, FTP requirements are determined by multiplying the linear
26 footage of the building's street-facing facades by a factor of four (4). For example, a
27 Category 1 building with 100 linear feet of street-facing facade requires 400 FTPs
28 (100 x 4 = 400).

29 2. *Category 2:* Building with one or two (2) single parking bays in the street yard.

30 For Category 2 site plans, FTP requirements are determined by multiplying the linear
31 footage of the building's street-facing facades by a factor of three (3). For example, a
32 Category 2 building with 100 linear feet of street-facing facade requires 300 FTPs.
33 (100 x 3 = 300).

34 3. *Category 3:* Buildings with no parking in the street yard.

35 For Category 3 site plans, FTP requirements are determined by multiplying the linear
36 footage of the building's street-facing facades by a factor of two (2). For example, a
37 Category 3 building with 100 linear feet of street-facing facade requires 200 FTPs.
38 (100 x 2 = 200).

39 c. Foundation treatment point credits. The number of required FTPs shall be achieved by
40 providing a combination of no less than three (3) of the following elements contained in the
41 table below to be located between the building and the first drive aisle. Additional elements
42 may be considered and a point value will be established by the zoning administrator on a
43 case by case basis.

Landscape Feature	Points Credited
Specimen tree (6" caliper or larger)	60
Medium or large tree	30
Ornamental tree	15
Large shrub	5
Small shrub	3
Groundcover planting	2 (per sq. ft.)
Groundcover - decorative	1 (per sq. ft.)
Perennials and annuals	0.5 (per sq. ft.)
Permanently irrigated container plantings	5 (per sq. ft.)
Decorative paving	2.5 (per sq. ft.)
Shade structure	30
Shade structure with vines	33
Site furniture	30
Bike rack	20
Trash receptacle	20

1

2 (i) *Irrigation.*

1 (1) *Underground automatic system.* All required landscape areas shall be irrigated by an
2 underground automatic system ~~that may include a drip irrigation system.~~ **Shrub, groundcover,
3 and perennial planting areas shall use drip irrigation. Turfgrass areas may utilize spray heads.**
4 This system shall adhere to manufacturer specifications and the rules and regulations established
5 by TCEQ or successor agency. In addition, an irrigation system must be designed by a landscape
6 architect or irrigator licensed by the state as described in subsection (3) below.

7 (2) *System requirements.* An irrigation system shall comply with the following:

- 8 a. Sprinkler head spacing shall be designed for head-to-head coverage and adjusted for
9 prevailing winds. The system shall promote minimum runoff and minimum overspray onto
10 non-irrigated areas (i.e., paving, walkway, buildings).
- 11 b. Sprinkler heads shall have matched precipitation rates within each control valve circuit.
- 12 c. Adjustable flow controls shall be required on circuit remote control valves. Pressure
13 regulation components shall be required where static pressure exceeds manufacturer's
14 recommended operating range.
- 15 d. Valves and circuits shall be separated based on water use requirements, so that turf areas
16 can be watered separately from shrubs, trees and groundcover areas. A minimum of one
17 bubbler each shall be provided for all large and medium size trees, except 4" caliper or larger
18 trees shall have a minimum of two (2) bubblers.
- 19 e. Serviceable check valves shall be required where elevation differential may cause low head
20 drainage adjacent to paving areas.
- 21 f. All automatic irrigation systems shall be equipped with an electronic controller capable of dual
22 or multiple programming. Controller(s) shall have multiple cycle start capacity and a flexible
23 calendar program, including the capability of being set to water every five (5) days.
- 24 g. All automatic irrigation systems shall be equipped with a rain and freeze sensor shut-off
25 device that will automatically shut down the irrigation system when the ambient temperature
26 falls below 40 degrees Fahrenheit.
- 27 h. Drip irrigation shall have flag heads at the end of the drip tubing.
- 28 i. Irrigation systems must be inspected at least once every three years by an inspector who
29 holds a license in compliance with the below subsection (3) License requirements. The
30 results of the inspection shall be submitted to the Utilities and Environmental Services
31 Director within 30 days following the inspection. This requirement shall not apply to irrigation
32 systems installed on residential properties in the SF-R (Single-Family—Rural); SF-1 (Single-
33 Family—Large Lot); SF-2 (Single-Family—Standard Lot); SF-3 (Single-Family—Mixed Lot);
34 SF-D (Single-Family—Downtown); and TF (Two-Family) zoning districts.

35 (3) *License requirements.*

- 36 a. Any person who connects an irrigation system to the water supply within the city or the city's
37 extraterritorial jurisdiction must hold a valid license, as defined by 30 Tex. Admin. Code ch.
38 30 and required by V.T.C.A., Occupations Code ch. 1903, or as defined by 22 Tex. Admin.
39 Code ch. 365 and required by V.T.C.A., Occupations Code ch. 1301.
- 40 b. A property owner is not required to be licensed in accordance with V.T.C.A., Occupations
41 Code, § 1903.002(c)(1) if he is performing irrigation work in a building or on premises owned
42 or occupied by the person as the person's home. A home or property owner who installs an
43 irrigation system must meet the standards contained in 30 Tex. Admin. Code ch. 344

1 regarding spacing, water pressure, spraying water over impervious materials, rain or
2 moisture shut-off devices or other technology, backflow prevention and isolation valves. See
3 V.T.C.A., Occupations Code § 1903.002 for other exemptions to the licensing requirement.

4 (4) *Permit required.*

5 a. Any person installing an irrigation system within the city limits or extraterritorial jurisdiction is
6 required to obtain a permit from the city. Any irrigation plan approved for a permit must be in
7 compliance with the requirements of 30 Tex. Admin. Code ch. 344.

8 b. Exemptions.

9 1. An irrigation system that is an on-site sewage disposal system, such as gray water
10 irrigation, as defined by V.T.C.A., Health and Safety; or

11 2. An irrigation system used on or by an agricultural operation as defined by V.T.C.A.,
12 Agriculture Code § 251.002.

13 c. The city building inspections department shall be responsible for issuing irrigation system
14 permits and collecting fees. To obtain a permit an applicant must submit a plan, complete an
15 application provided by the department, and pay the applicable fee.

16 (5) *Water conservation.* All irrigation systems shall be designed, installed, maintained, altered,
17 repaired, serviced, and operated in a manner that will promote water conservation.

18 (6) *Design, installation and operation.* V.T.C.A., Occupations Code § 1903.053 (standards), and 30
19 Tex. Admin. Code ch. 344, as amended, are hereby incorporated by reference as the minimum
20 standards and specifications for designing, installing, and operating an irrigation system within
21 the city or the city's extraterritorial jurisdiction.

22 (7) *Items not covered by the subsection.* Any item not covered by this subsection and required by
23 law shall be governed by V.T.C.A., Occupations Code, V.T.C.A., Water Code, 30 Tex. Admin.
24 Code, and any other applicable state statute or Texas Commission on Environmental Quality rule.

25 (8) *Fees.* The fees for obtaining and renewing an irrigation permit may be found in Sec. 8-106. These
26 fees will be in amounts sufficient to cover the city's costs in issuing and renewing the permits,
27 including but not limited to staff time and other overhead costs.

28 (9) *Enforcement.*

29 a. The city shall have the power to administer and enforce the provisions of this subsection as
30 may be required by governing law. Any person, firm, corporation or agent who shall violate
31 a provision of this Code, or fails to comply therewith, or with any of the requirements thereof,
32 is subject to suit for injunctive relief as well as prosecution for criminal violations. Any
33 violation of this subsection is declared to be a nuisance.

34 b. Nothing in this subsection shall be construed as a waiver of the city's right to bring a civil
35 action to enforce the provisions of this subsection and to seek remedies as allowed by law,
36 including but not limited to the following:

37 1. Injunctive relief to prevent specific conduct that violates the subsection or to require
38 specific conduct that is necessary for compliance with the subsection; and

39 2. Other available relief.

40 (j) *Alternative compliance.*

- 1 (1) In cases where a particular site opportunity exists; a creative design has been proposed; or
2 where there is an unusual site encumbrance, an application for an alternative landscape plan
3 which does not strictly comply to the standards of this section may be submitted for approval to
4 the zoning administrator. If the zoning administrator denies the application for the alternative plan,
5 the applicant may, within 15 business days after receipt of notice of such denial, appeal the
6 decision to the zoning board of appeals (ZBA).
- 7 (2) An application for alternate compliance must include a letter stating how the plan meets the
8 purpose and intent of the Code and the details of the methods used to meet such intent. In
9 addition, a comparison detailing the landscape elements required to satisfy strict compliance
10 versus the alternative plan must be provided.
- 11 (3) In rendering a decision on an alternate compliance plan, the zoning administrator shall consider
12 appropriate circumstances including, but not limited to:
- 13 a. Does the plan result in a creative arrangement of new large or medium trees?
14 b. Does the plan maximize water conservation?
15 c. Does the plan minimize the removal of existing trees or alteration of other significant natural
16 features, such as rock outcroppings, floodplain or waterways?
17 d. Is the plan contextually comparable to surrounding developments in the immediate area?
18 e. Is the site encumbered by easements that prohibit placement of landscaping as required by
19 this section?
- 20 (k) *Implementation.*
- 21 (1) *Inspection.* Prior to the issuance of a certificate of occupancy for the project, a landscape
22 architect, or the identified professional as determined for small project site plans, shall inspect
23 each site and certify on the appropriate city form that the site meets the requirements of this
24 section and conforms to the approved site plan and/or landscape plan. Upon receipt of the
25 certification, the zoning administrator shall verify that all requirements have been met.
- 26 (2) *Certificates of occupancy.*
- 27 a. Prior to the issuance of a certificate of occupancy, the developer/owner shall either have
28 completed the installation of all required landscaping or shall file with the zoning
29 administrator fiscal security (by bond, certificate of deposit, letter of credit or cash security)
30 satisfactory to the city, in the amount of a contractor's estimate using current market prices
31 for materials and installation of the required landscaping plus a 20 percent contingency. The
32 contractor's estimate shall be subject to the approval of the zoning administrator.
- 33 b. Any developer/owner wishing to file fiscal security must also grant license to the city to enter
34 upon the land for the purposes of installing the required landscaping in the event of
35 nonperformance.
- 36 c. Except as provided in subsection d. below, all required landscaping must be installed or
37 planted no later than 45 days from the issuance of a certificate of occupancy unless
38 otherwise approved in writing by the city.
- 39 d. In the event that mandatory water restrictions have been implemented by the city council or
40 city manager in accordance with Sec. 44-233 of the Code of Ordinances, the
41 developer/owner shall comply with the applicable restrictions and regulations contained
42 therein.

1 (3) *Maintenance.*

- 2 a. All required landscaping, irrigation systems, fences, walls, berms, vegetation and other
3 landscape components shall be maintained by the owner or agent in a healthy, safe and
4 operating condition.
- 5 b. Maintenance practices shall consist of all regular and normal maintenance operations of
6 landscaping including, but not limited to, weeding, irrigation, fertilizing, pruning, mowing and
7 litter pick-up. Plant material that exhibits severe levels of insect or pest infestation, disease
8 and/or damage, shall be appropriately treated, and all dead plant material shall be removed
9 and replaced with living plant material where required according to the city approved plan
10 for the site.
- 11 c. Street right-of-way between a property line and curb or street pavement adjoining the
12 property shall be maintained by the adjacent landowner.
- 13 d. It shall be the responsibility of the owner to maintain and properly irrigate all landscaping
14 required by this section. Failure to replace dead or diseased plant material within 30 days of
15 written notification by the city shall constitute a violation of the zoning ordinance.
- 16 e. It shall be unlawful for any person to damage required landscaping through tree topping,
17 over pruning or chemical poisoning. It shall be an affirmative defense that a
18 maintenance/pruning plan was approved by the zoning administrator and that the work was
19 performed in compliance with said approved plan. In the event that required landscaping has
20 been so severely damaged due to tree topping, over pruning or chemical poisoning that it
21 has died, the developer/owner shall replace the landscaping within 45 days of written notice
22 from the city.

23 (l) *Requirements for new construction of single-family and two-family residences in the SF-2 (Single-*
24 *family - Standard Lot), SF-3 (Single-family - Mixed Lot), and TF (Two-family) zoning districts.*

25 (1) **Turfgrass Requirements**

- 26 ~~a. Drought tolerant turf grass shall be limited to 50% of the lot area that is not planted on all~~
27 ~~portions of a residential lot not covered by buildings or, hardscaping, or planting beds.~~
- 28 ~~b. Where Habirturf®, Native Sun Turf™, or Thunder Turf™ are specified, the 50% coverage~~
29 ~~limitation shall not apply.~~
- 30 ~~c. Improved soils with a minimum of 20% organic content and soil depth of six (6) inches shall~~
31 ~~be provided for turfgrass areas.~~
- 32 ~~d. Turfgrass shall not be installed between sidewalks and back of curb adjacent to street rights~~
33 ~~of way.~~

34 (2) **Tree Requirements**

- 35 ~~a. The front yard of all residential lots shall contain trees at the following minimum rate, according~~
36 ~~to lot width at the front building line:~~

37

Lot Width	40-49 feet	50-69 feet	70 feet and greater
Large Trees	1	1	2

	80 feet or less	Greater than 80 feet
Large trees	1	2
Small trees	1	3

- 1 -
- 2 (3)
- 3 b. Residential lots that abut parks, trails, or similar public open spaces on the side or rear yard
4 shall contain a minimum of one (1) large tree in and one (1) small tree in each yard that abuts
5 said space.
- 6 c. All large trees shall have a caliper of three (3) inches at time of planting and shall be container
7 grown.
- 8 d. Large trees shall not be planted closer than five (5) feet to any lot line, fire hydrant, underground
9 utility (excluding irrigation), or water meter box, and no closer than four (4) feet to any
10 sidewalk, driveway, or curb.
- 11 e. All minimum required trees shall be in conformance with the preferred species listed in the tree
12 technical manual.
- 13 ~~Residential lots that abut parks, trails, or similar public open spaces on the side or rear yard shall~~
14 ~~contain a minimum of one (1) large tree and one (1) small tree in each yard that abuts said space.~~
- 15 ~~(4) All large trees shall have a caliper of three (3) inches and small trees shall have a caliper of one (1)~~
16 ~~inch at time of planting and shall be container grown.~~
- 17 ~~(5) Large trees shall not be planted closer than five (5) feet to any lot line, fire hydrant, underground utility~~
18 ~~(excluding irrigation), or water meter box, and no closer than four (4) feet to any sidewalk, driveway, or~~
19 ~~curb.~~
- 20 ~~(6) Improved soils with a minimum 20% organic content shall be provided in all required landscape~~
21 ~~areas to a minimum depth of four (4) inches.~~
- 22 (73) **General Planting Requirements**
- 23 ~~a. Underground irrigation shall not be required for landscaped areas. However, should~~
24 ~~underground irrigation be implemented it shall be in accordance with subsection (i) above.~~
25 ~~Irrigation may be supplemented with a rainwater harvesting system. Landscape planting beds~~
26 ~~shall provide improved soil with a minimum of 20% organic content and minimum improved soil~~
27 ~~depth of eight (8) inches.~~
- 28 ~~b. (8) Nothing shall be erected, placed, allowed to grow, or planted so that it impedes vision~~
29 ~~between the height of three (3) feet and 10 feet above the curb within a sight visibility triangle.~~
- 30 ~~(9) All minimum required trees shall be in conformance with the preferred species listed in the Tree~~
31 ~~Technical Manual.~~

1 ~~c. (10)~~—No artificial plant material may be used in any form to satisfy the requirements of this
2 section.

3 ~~(34)~~ Irrigation

4 ~~a. Underground irrigation shall not be required for landscaped areas. However, should~~
5 ~~underground irrigation be implemented it shall be in accordance with subsection (i) above.~~

6 ~~b. Where installed, drip irrigation shall be utilized for planting beds and planting areas between~~
7 ~~sidewalk and back of curb adjacent to street rights of way.~~

8 ~~c. Irrigation may be supplemented with a rainwater harvesting system~~

10 IV.

11 That Zoning and Development Code, Chapter 8, Article V, Section 8-40, Code of
12 Ordinances (2018 Edition), City of Round Rock, Texas, is hereby amended as follows:

13 Sec. 8-40. - Screening.

14 (a) Purpose.

15 (1) The purpose of this section is to establish requirements to screen specific uses or structures
16 from public view. All landscape material required in this subsection shall be provided in an eight-
17 foot wide linear planting bed unencumbered by easements. Buffers shall provide a visual barrier
18 between land uses, enhance the streetscape, and provide privacy. The spacing requirements
19 between trees in the Tree Technical Manual shall not apply to this subsection. Compliance with
20 this subsection requires that all detention ponds, water quality ponds, ground-mounted equipment
21 (i.e., transformers, air conditioner units), dumpsters, trash receptacles, donation receptacles,
22 refuse storage containers, outdoor storage, loading docks, substations, large utility cabinets,
23 water and wastewater pumping stations, storage sites, and other similar uses be sufficiently
24 screened. Required landscape material shall be located to maximize the screening of these
25 facilities.

26 (2) All proposed detention and water quality facilities shall be screened from public view by means
27 of the following landscape elements:

28 a. Water quality ponds/detention ponds with structured walls.

29 1. One medium tree shall be planted for every 40 linear feet or portion thereof around the
30 boundary of the pond;

31 2. One small tree shall be planted for every 30 linear feet portion thereof around the
32 boundary of the pond; and

33 3. One large shrub shall be planted for every eight (8) linear feet or portion thereof around
34 the boundary of the pond; or

35 4. The foregoing tree and shrub requirements may be eliminated and replaced with the
36 following:

37 (i) The exterior walls of the pond shall be clad with limestone and/or other textured
38 design features; and

- 1 (ii) If a chain-link fence is utilized, a native/adapted vine in at least a five-gallon
2 container shall be planted for every eight (8) linear feet of fence.
- 3 b. Water quality ponds/detention ponds with earthen berms shall be planted with one large tree
4 for every 40 linear feet around the boundary of a non-structured detention/retention pond.
- 5 (3) *Dumpster and trash receptacles.* All dumpsters, trash receptacles, and refuse storage containers
6 shall be located within an enclosure providing screening ~~by means of both the following landscape~~
7 ~~elements: as described below:~~
- 8 a. A decorative masonry wall having a minimum height of six (6) feet on three (3) sides and a
9 gate on the fourth side. The gate shall be constructed with an opaque, non-masonry material.
10 The construction materials of the wall shall match material used on the principal building
11 located on the same lot.
- 12 ~~b. Small shrubs shall be arranged as foundation planting around the perimeter of the pad area~~
13 ~~except the side where the gate is located. One small shrub shall be planted at each end of~~
14 ~~and every three (3) linear feet in a three-foot (3') wide landscape area. The landscape~~
15 ~~requirements of this subsection do not apply when the enclosure is an architectural extension~~
16 ~~of a principal building.~~
- 17 (4) *Donation receptacles.* All donation receptacles shall be located within an enclosure providing
18 screening by means of a decorative masonry wall on three (3) sides. The wall shall be at least as
19 tall as the donation receptacle it screens. The construction materials of the wall shall be
20 complementary to the material used on the principal building located on the same lot.
- 21 (5) *Ground-mounted equipment.* All proposed ground-mounted equipment shall be screened by the
22 planting of one large shrub every four (4) linear feet around the boundary of the equipment in a
23 planting bed with edging. Shrubs shall be evergreen and a minimum height of 24 inches at time
24 of planting.
- 25 (6) *Substations, water/wastewater stations.* Proposed electric substations, water pump stations and
26 wastewater lift stations shall be screened from public views by means of a six-foot decorative
27 masonry wall on a minimum of three sides. Smooth-face concrete masonry units are prohibited.
28 The following landscape elements shall be incorporated:
- 29 a. An eight-foot (8') wide planting bed with one small evergreen tree per 12 linear feet; provided
30 that said trees shall be planted no closer than eight (8) feet and no more than 16 feet apart;
31 or
- 32 b. A five-foot (5') wide planting bed with one large shrub for every four (4) linear feet. Shrubs
33 may be planted in a variety of configurations, but at no time shall be planted greater than six
34 (6) feet apart. Shrubs shall be evergreen and a minimum height of 24 inches at time of
35 planting.
- 36 (7) *Outdoor storage.* All outdoor storage shall be screened in accordance with the requirements of
37 Sec. 8-65. In addition, outdoor storage shall be screened as follows:
- 38 a. *Limited outdoor storage.*
- 39 1. An eight-foot (8') wide planting bed with one small evergreen tree per 12 linear feet of
40 wall constructed; provided that said trees shall be planted no closer than eight (8) feet
41 and no farther than 16 feet apart; or

1 acted upon, all as required by the Open Meetings Act, Chapter 551, Texas Government
2 Code, as amended.

3
4 Alternative one.

5 By motion duly made, seconded and passed with an affirmative vote of all the
6 Council members present, the requirement for reading this ordinance on two separate
7 days was dispensed with.

8 **READ, PASSED, and ADOPTED** on first reading this ____ day of
9 _____, 2025.

10 Alternative 2.

11 **READ and APPROVED** on first reading this the ____ day of
12 _____, 2025.

13 **READ, APPROVED and ADOPTED** on second reading this the ____ day of
14 _____, 2025.

15
16 _____
17 CRAIG MORGAN, Mayor
18 City of Round Rock, Texas

19
20 ATTEST:
21
22 _____
23 ANN FRANKLIN, City Clerk