

**Enhanced Development Menu
- Resource Guide -**

The Enhanced Development Menu (EDM) is a point-based system of sustainable development options ranging from renewable energy to public art. New development must achieve a required number of points based on the project’s square footage. This handout includes resources to help applicants comply with the Enhanced Development Menu (Sec. 17.13.2 of the Lakewood Zoning Ordinance). Contact the Planner of the Day at pod@lakewood.org with any questions.

Contents

Intent 2

Applicability 2

Required Points 2

Fee-in-Lieu 2

Developments over 150,000 square feet 3

Menu Items 3

 Item 1 – Green Building Certification 5

 Item 2 – Energy-efficient Outdoor Lighting 5

 Item 3 – Renewable Electricity Production – On-Site Installation 6

 Item 4 – Renewable Electricity Production – Off-Site Subscription or Community Solar Garden 6

 Item 5 – On-Site Renewable Energy Systems and Design 7

 Item 6 – Building Electrification 8

 Item 7 – Hydrozones 9

 Item 8 – Water Budgeting 10

 Item 9 – Pollinator-Friendly Landscaping 10

 Item 10 – Water Quality 11

 Item 11 – Recycling and Composting Enclosures 12

 Item 12 – Recycling and Composting Service Contracts 12

 Item 13 – Deconstruction 13

 Item 14 – Urban Heat Island Reduction 13

 Item 15 – Low-Carbon Concrete 14

 Item 16 – Reclaimed and Recycled Materials 15

 Item 17 – Adaptive Reuse 16

 Item 18 – Multimodal Transportation Assessment – Residential 17

 Item 19 – Multimodal Transportation Assessment – Non-Residential 17

 Item 20 – Bike Amenities 18

 Item 21 – Public EV Charging Stations 18

 Item 22 – Above-code EV Charging Stations 19

 Item 23 – Enhanced Streetscapes 19

 Item 24 – Social Connection Amenities 20

 Item 25 – Public Art 21

 Item 26 – Adaptability / Universal Design 22

 Item 27 – On-site Food Production 23

 Item 28 – Open Option 24

Intent

The EDM is intended to ensure new development is a positive investment in the community, either by directly providing community amenities or by minimizing the impact on limited water and energy resources. It is designed to be flexible and context-specific, allowing for a wide variety of items to be implemented within a development site that holistically promote city goals.

Applicability

New Development: The Menu applies to new attached dwellings, multifamily, mixed-use, and non-residential developments with buildings with a cumulative gross square footage over 2,500 square feet. It also applies to subdivisions creating lots for 3 or more residential units.

Existing Development: The Menu applies to major additions, remodels, and alterations to existing developments with a cumulative proposed gross square footage over 2,500 square feet. Major additions, remodels, and alterations are those that require review under section 17.2.7: Major Site Plans, generally a change to 20% or more of the development.

Affordable Housing: Square footage dedicated to affordable housing (defined in Lakewood Municipal Code section 15.02.020) is excluded from the gross floor area for the purposes of determining required points.

Historic Preservation: The required points are reduced by 50% for projects which include a designated historic landmark on the local, state, or national registers AND which receive approval of the proposed project from the Lakewood Historic Preservation Commission.

Required Points

For all applicable developments, the number of points required to be achieved from the Menu is determined by square footage as rounded to the nearest 1,000 square feet. One (1) point is required per 1,000 square feet, with a minimum of 10 points and a maximum of 150 points, as shown in the table below:

Project Cumulative Gross Floor Area (rounded to nearest 1,000 sf)	Required Points
< 2,500 sf	N/A (0 points)
2,500 sf – 10,000 sf	10 points
11,000 sf – 150,000sf	11 – 150 points (1 point per 1,000 sf)
Over 150,000 sf	150 points <i>and</i> select one option set forth in section 17.13.2.3, as shown on the next page

Fee-in-Lieu

For projects over 50,000 square feet, a fee-in-lieu may be paid for required points over 50 at a rate of \$4,000 per point plus \$10 per point for every 1,000 square feet over 150,000 square feet, as shown in the table below. A minimum of 50 points must be achieved from the Menu items.

Project Cumulative Gross Floor Area (rounded to nearest 1,000 sf)	Fee-in-Lieu Rate per Point
2,500 sf – 150,000sf	\$4,000
Over 150,000 sf	\$4,000 + \$10 per 1,000 sf over 150,000 sf

For example, a 200,000 sf project would pay $\$4,000 + \$10 \times [(200,000-150,000)/1000] = \mathbf{\$4,500}$ per point.

Developments over 150,000 square feet

Large-scale developments must select from three high-impact options as part of achieving the required 150 points. These options are:

1. Green Building Certification: Earn LEED Gold or NGBS Gold or better (EDM Item 1; satisfies all 150 required points)
2. Prerequisite Menu Items: Earn a minimum of 40 points – 20 points from each category – from the menu items identified below:
 - Environmental Impacts (min. 20 points):
 - Renewable Energy (EDM Items 3, 4, and 5)
 - Electrification (EDM Item 6)
 - Social Impacts (min. 20 points):
 - Enhanced Streetscapes (EDM Item 23)
 - Social Connection Amenities (EDM Item 24)
3. Fee-in-Lieu for Prerequisite Menu Items: If 40 points are not earned through the prerequisite items above, the fee-in-lieu for those points (up to 40) is 1.5 times the per-point value for the size of the development.
 - For example, if the 200,000 sf project proposes to earn 20 points from Environmental Impacts and 0 points from Social Impacts, the fee-in-lieu due for the 20 missing prerequisite points is 1.5 times the rate calculated in the previous section as \$4,500 per point, or $1.5 \times \$4,500 = \$6,750$ per prerequisite point.

The prerequisite Menu items detailed later in this guide are indicated by a star ★.

Menu Items

The EDM Summary Table shown on the next page lists all of the available menu items and their associated points. This table should be placed on the cover sheet of the formal Site Plan submittal and revised to include only those items which are proposed as part of a particular project.

On the following pages of this guide, each Menu item is described in greater detail, including the required documentation to demonstrate compliance, sample calculation tables, and links to outside resources for more information. All documentation must be incorporated into the appropriate plan sets (Site Plan, Civil Plans, Construction Documents) unless otherwise indicated, and will be reviewed during the typical development review process. The specific documentation items listed in this guide may not be exhaustive, and additional information may be requested depending on the details of an individual project.

Enhanced Development Menu Summary Table

(Place on Site Plan cover sheet. Delete any unused items)

Menu item		Points possible	Points proposed	Sheet in Plan Set	Notes (item details, deferred submittals, etc.)
1	Green Building Certification	75 – 100%			
2	Energy efficient outdoor lighting	2			
3	Renewable electricity production – on-site	20 – 38			
4	Renewable electricity production – off-site CSG	10 – 28			
5	On-site renewable energy systems and design	10 – 28			
6	Building Electrification	50%			
7	Hydrozones	2			
8	Water budgeting	2 – 6			
9	Pollinator-friendly landscaping	2 – 10			
10	Water Quality	5			
11	Recycling and composting enclosures	5			
12	Recycling and composting services	10			
13	Deconstruction	3 – 12			
14	Urban heat island reduction	5 – 20			
15	Low-Carbon Concrete	5			
16	Reclaimed/ recycled materials	5			
17	Adaptive Reuse	10 – 15			
18	Multimodal assessment – Residential	2			
19	Multimodal assessment – Non-Residential	2			
20	Bike amenities	2 – 5			
21	Public EV charging infrastructure*	5 – 30			
22	Above-code EV charging infrastructure*	5 – 30			
23	Enhanced Streetscapes	5 – 40			
24	Social connection amenities	2 – 20			
25	Public art	2 – 25			
26	Adaptability / Universal Design	5			
27	On-site food production	15			
28	Open Option	2 – 150			

Item 1 – Green Building Certification ★

Points Possible: 75% - 100% of required points

Description

Achieve LEED Gold or Platinum, or NGBS Gold or Emerald to earn 100% of required points. Achieve LEED Silver or NGBS Silver to earn 75% of required points. Other certifications may be requested through Item 28: Open Option. Developments proposing green building certification may be referred to a consultant of the city's choosing for review. The cost of such review will be paid by the applicant.

Intent

Certified buildings support the range of community energy, water, and green building goals.

Documentation Required with Major Site Plan

- Documentation of a qualified professional (such as LEED AP) on the project design team
- Project registration receipt
- Preliminary checklist/scorecard demonstrating how certification is achievable
 - This may be referred to a third-party consultant for review.

Documentation Required with Building Permit

- Checklist/scorecard demonstrating certification based on final building design
 - This may be referred to a third-party consultant for review.

Resources

- Learn more about [LEED certification](#).
- Get more information about [NGBS certification](#).

Item 2 – Energy-efficient Outdoor Lighting

Points Possible: 2

Description

Use outdoor lighting fixtures that are ENERGY STAR or DLC certified *and* are IDA Dark Sky approved.

Intent

Energy efficient and dark-sky lighting reduces energy consumption and associated energy costs to help the city achieve its community energy efficiency goals, while also benefitting human and wildlife health by minimizing glare, reducing light trespass, and avoiding pollution of the night sky.

Documentation Required with Major Site Plan

- With photometric plan, use light fixture product specifications/cut sheets that indicate ENERGY STAR and/or DLC certification *and* IDA Dark Sky certification.
 - When different color temperature options are available, clearly indicate on the cut sheet which Dark Sky approved color is selected.

Resources

- Use the [ENERGY STAR product finder](#) or the [DesignLights Consortium \(DLC\) Qualified Product List](#) to compare certified lighting products.
- Find [Dark Sky friendly lighting](#) with the International Dark-Sky Association (IDA)'s Fixture Seal of Approval.
- Refer to the [Federal Energy Management Program efficiency requirements for outdoor lighting](#).

★ High-impact item; prerequisite for developments over 150,000 sf.

Item 3 – Renewable Electricity Production – On-Site Installation ★

Points Possible: 20 – 38

Description

20 points for 10% of projected electricity use offset by on-site renewable electricity sources, such as solar photovoltaic or wind-powered systems.

1 additional point per 5% additional electricity offset, up to 38 points (100% offset).

Intent

Renewable electricity reduces the demand on the electrical grid, which is generated using fossil fuels, and results in long term utility savings for tenants and owners.

Documentation Required with Major Site Plan

- Show renewable electricity system (solar PV or wind) size and location on relevant sheets.
- Include a table calculating the projected electricity usage of the proposed development, the anticipated electricity generation of the renewable system, and percentage of projected electricity offset by the on-site system.

Projected annual electricity usage (kWh)	A
Estimated annual electricity production* (kWh)	B
Percent electricity offset by renewable system	B / A = C

* Identify the method used to estimate annual electricity production (PVWatts, vendor, etc.)

Documentation Required with Building Permit

- Proof of ownership of the renewable electricity system or a signed lease agreement for a period of at least 15 years and structured to survive a partial or full transfer of ownership of property.

Resources

- Use the Greenhouse Gas Mitigation Program Worksheet to project the development’s annual energy usage.
- Use NREL’s [PVWatts Calculator](#) to estimate the energy production of photovoltaic (PV) systems.
- Xcel Energy’s [New Building Programs](#) offer assistance with energy efficient building design, including projecting energy use, construction rebates, and renewable energy options.

Item 4 – Renewable Electricity Production – Off-Site Subscription or Community Solar Garden ★

Points Possible: 10 – 28

Description

10 points for 10% of projected electricity use offset by off-site renewable electricity sources, such as community solar gardens.

1 additional point per 5% additional electricity offset, up to 28 points (100% offset).

Intent

Renewable electricity reduces the demand on the electrical grid, which is generated using fossil fuels, and results in long term utility savings for tenants and owners.

★ High-impact item; prerequisite for developments over 150,000 sf.

Documentation Required with Major Site Plan

- Identify the intended subscription or community solar garden.
- Include a table calculating the projected electricity usage of the proposed development, the amount of renewable electricity to be procured off-site, and the percentage offset.

Projected annual electricity usage (kWh)	A
Estimated annual electricity production (kWh)	B
Percent electricity offset by renewable system	B / A = C

Documentation Required with Building Permit

- Proof of ownership of the off-site renewable electricity shares or a signed lease agreement for a period of at least 15 years and structured to survive a partial or full transfer of ownership of property. Please highlight the relevant sections.

Resources

- Use the Greenhouse Gas Mitigation Program Worksheet Calculator to project the development’s annual energy usage.
- Xcel Energy’s [New Building Programs](#) offer assistance with energy efficient building design, including projecting energy use, construction rebates, and renewable energy options.
- Search for community solar gardens at the [Energy Sage website](#)

Item 5 – On-Site Renewable Energy Systems and Design ★

Points Possible: 10 – 28

Description

10 points for 10% of projected energy use intensity (EUI) offset by on-site renewable energy systems or design, such as heat pumps, solar thermal or geothermal systems, or passive solar design.

1 additional point per 5% additional EUI offset, up to 28 points (100% offset).

This item does not include renewable electricity generation systems, such as solar photovoltaic or wind, which are covered by Items 3 and 4. Points can be earned for *either* this item *or* Item 6 – Building Electrification, but not both.

Intent

Renewable energy systems and energy efficient design choices reduce the demand for GHG-emitting natural gas heating and result in long term utility savings for tenants and owners.

Documentation Required with Major Site Plan

- Show on-site renewable energy system location and/or design features on relevant sheets.
- Calculation demonstrating the projected energy usage per square foot of the proposed development, the anticipated reduction in energy use per square foot due to the renewable system and/or design choices, and percentage of projected energy use per square foot offset by the on-site system or design.

Projected baseline annual energy use per square foot	A
Estimated reduction in annual energy use per square foot	B
Percent energy use offset by renewable system	B / A = C

★ High-impact item; prerequisite for developments over 150,000 sf.

Documentation Required with Building Permit

- Proof of ownership of the renewable electricity system or a signed lease agreement for a period of at least 15 years and structured to survive a partial or full transfer of ownership of property. Please highlight the relevant sections.

Resources

- Use the Greenhouse Gas Mitigation Program Worksheet Calculator [link] to project the development's annual energy usage.
- Xcel Energy's [New Building Programs](#) offer assistance with energy efficient building design, including projecting energy use, construction rebates, and renewable energy options.
- Xcel Energy Residential and Non-residential [programs and rebates website](#)

Item 6 – Building Electrification ★

Points Possible: 50% of total required points.

Description

Use all electric space conditioning, water heating, and appliances to eliminate natural gas usage within the project. Points can be earned for **either** this item **or** Item 5 – On-Site Renewable Energy Systems & Design, but not both.

Intent

Systems set up for natural gas will continue to burn fossil fuel for 20 to 30 years. All-electric systems have the potential to become zero-emissions much sooner due to rapid increases in renewable energy supplying the electrical grid and greater access to on- and off-site renewable electricity options.

Documentation Required with Major Site Plan

- Note on cover sheet indicating that the project will be all electric, with no natural gas service.
- Demonstrate on Utility Plan (part of civil plan set) that no natural gas service will be provided to the site.

Documentation Required with Building Permit

- Note on cover sheet indicating that the project will be all electric, with no natural gas service. Include a table identifying the type of equipment used for space conditioning, water heating, and cooking and laundry appliances, if applicable, and the location within the construction plan set for details of each item.

Resources

- Xcel Energy's [New Building Programs](#) offer assistance with energy efficient building design, including projecting energy use, construction rebates, and renewable energy options.
- [Rocky Mountain Institute article](#) on savings for All-Electric New Homes
- Group14 Engineering [Colorado Building Electrification Report](#)

★ High-impact item; prerequisite for developments over 150,000 sf.

Item 7 – Hydrozones

Points Possible: 2

Description

Select plants appropriate to the local climate and group them in zones according to water need for efficient landscape irrigation.

Intent

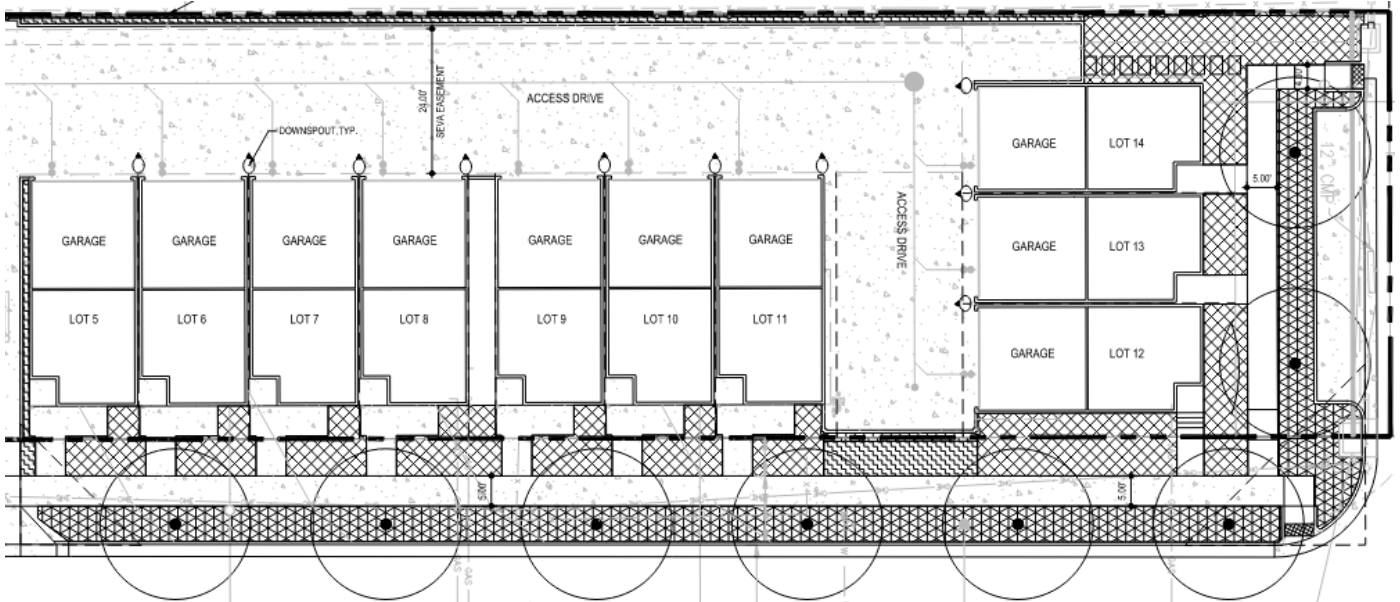
Hydrozones connect plant selection and landscape design with irrigation systems to conserve water, helping the city to achieve its community water efficiency goals.

Documentation Required with Major Site Plan

- Depict hydrozones as part of landscape plans. May be a separate sheet or a smaller detail plan.
- Include a brief description of each hydrozone with typical irrigation schedule and annual water usage in gallons per square foot (gpsf).
- Identify the specific water requirements for each species in the plant schedule.

Resources

- Refer to the following plant lists for ideas on groupings with similar water needs:
 - [Colorado State University Extension](#)
 - [City of Loveland](#)
 - [City of Westminster](#)
 - [WaterSense](#)
- Refer to the sample hydrozone plan below as an example.



1
7

HYDROZONE PLAN
SCALE: 1"= 10'

HYDROZONE LEGEND:

	LOW (3 GAL/SF/SEASON)
	MEDIUM (10 GAL/SF/SEASON)
	HIGH (18 GAL/SF/SEASON)

Item 8 – Water Budgeting

Points Possible: 2 – 6

Description

To earn 2 points, provide water-conserving landscape designs that meet or fall below Denver Water benchmark of 12 gallons per square foot (GPSF) of pervious area annually. Earn 1 additional point for each gallon per square foot below the benchmark, up to a maximum of 6 points (8 GPSF). Water used for community-serving food production is exempt.

Intent

Water budgeting conserves water, helping the city to achieve its community water efficiency goals.

Documentation Required with Major Site Plan

- Projected outdoor water use of the site in GPSF of pervious area annually (maximum 12 GSFP) along with hydrozone plan

Documentation Required with Building Permit

- Ensure irrigation plans match the hydrozone water needs to stay within the water budget approved in the Site Plan.

Resources

Download the [EPA Water Budget Tool](#) to help estimate landscape water requirements.

Sample Calculation Tables

Month	Hydrozone Water Requirement (inches per week x weeks per month)			
	Very Low	Low	Moderate	High
April	sum	sum	sum	sum
May	↓	↓	↓	↓
June	↓	↓	↓	↓
July	↓	↓	↓	↓
August	↓	↓	↓	↓
September	↓	↓	↓	↓
October	↓	↓	↓	↓
TOTAL	a	b	c	d
Convert to gallons per sf (inches x 0.62)	a x 0.62 = A	b x 0.62 = B	c x 0.62 = C	d x 0.62 = D

Hydrozone	Annual Water Needs (gal/sf)	Zone Area (sf)	Annual Water Usage (gallons)
Very Low	A	E	A x E = F
Low	B	sum	sum
Moderate	C	↓	↓
High	D	↓	↓
TOTAL		X	Y
Overall Annual Outdoor Water Usage (gal/sf)		X / Y = Z	

Annual Water Usage (gal/sf)	Points
Z ≤ 8	6
Z = 8.1 to 9	5
Z = 9.1 to 10	4
Z = 10.1 to 11	3
Z = 11.1 to 12	2

Item 9 – Pollinator-Friendly Landscaping

Points Possible: 2 – 10

Description

Use plant materials that provide food and habitat for pollinators such as bees, wasps, butterflies, and birds throughout the landscape plan. Focus on using native species. Plan for environmentally sensitive and pollinator-friendly land management strategies whenever possible. Share your efforts with the community by installing interpretive signage to identify the pollinator habitat!

Earn two points per 120 contiguous square feet of pollinator-friendly landscape design, up to a maximum of 10 points (600 square feet). Individual 120 sf pollinator gardens do not have to be contiguous with each other to earn points.

Intent

Pollinators are essential to the health of our local ecosystems. Focusing on native plant species not only saves water but also enhances biodiversity.

Documentation Required with Major Site Plan

- Show detail landscape plans for each section of pollinator habitat. Include a specific plant list indicating the native range, types of pollinators which are attracted, water requirements, and any particular management notes (such as to leave foliage over winter).
- Identify habitat features such as water sources, logs, etc.
- Show location and provide detail of sign identifying the garden as pollinator habitat.

Resources

- Get tips on [creating pollinator habitat](#) from Colorado State University Extension.
- Check out the [Pollinator Partnership's Great Plains - Palouse Dry Steppe Province](#) or [Southern Rocky Mountain Steppe](#) planting guides for recommendations specific to Lakewood's ecoregion.
- The Xerces Society also provides [pollinator-friendly native plant lists](#) by state.
- The National Wildlife Federation offers a [Native Plant Finder](#) to search by zip code, and has an easy-to-use [checklist](#) of features to create a wildlife habitat garden. A [certification](#) is also available.
- The Butterfly Pavilion offers a variety of [Pollinator Services](#) for assistance with landscape design and habitat restoration.

Item 10 – Water Quality

Points Possible: 5

Description

For projects not otherwise required to install stormwater drainage improvements, voluntarily provide on-site water quality improvements utilizing site-appropriate best management practices to help retain stormwater.

Intent

On-site water quality improvements help keep Lakewood's waterways clean and safe.

Documentation Required with Major Site Plan

- Provide a drainage report demonstrating the water quality capture volume in accordance with Mile High Flood District Urban Storm Drainage Criteria Manual Volume 3, to be approved by the Public Works Department.
- Identify the water quality features on the site and landscape plan sheets within the Major Site Plan set.
- Identify all drainage features on the civil plans submitted and reviewed concurrently with the Major Site Plan.

Resources

- [Mile High Flood District Urban Storm Drainage Criteria Manual Volume 3](#)
- Get information about best practices for [Low Impact Development](#).
- Contact the [Public Works Department](#) to coordinate any proposed water quality improvements.

Item 11 – Recycling and Composting Enclosures

Points Possible: 5

Description

Designate space on site for collection of a minimum of 3 waste streams: trash, recyclables, and organics (or other applicable waste stream based on the building use). Space provided for trash, recycling, and compost must be of equal size.

Intent

Constructing waste enclosures sized to accommodate multiple waste streams enables future users to provide recycling and composting collection services and divert waste from landfills, helping the city achieve its community zero waste goals.

Documentation Required with Major Site Plan

- Location and dimensions of waste enclosures for trash, recycling, and compost (or alternative waste stream)
- Describe in a note and/or depict on floor plans any internal waste infrastructure (trash and recycling chutes, countertop food scrap bins, etc.)

Resources

See Lakewood Zoning Ordinance sections [17.6.3](#) (residential uses) or [17.7.3](#) (all other uses) for screening requirements and waste enclosure design.

Item 12 – Recycling and Composting Service Contracts

Points Possible: 10

Description

Provide recycling and composting collection services (or other applicable waste stream based on the building use and management) in addition to trash collection service. Service contracts must be for a minimum of 2 years after receiving a Certificate of Occupancy.

Intent

Providing recycling and composting service supports waste diversion from landfills, helping the city achieve its community zero waste goals, and encourages behavioral change.

Documentation Required with Major Site Plan

Indicate in the EDM Summary Table how the collection services are planned to be implemented. Describe model of service, frequency of collection, any containers/bin provided to building occupants, haulers contacted to date for estimates, etc. Compost collection can be replaced with an alternative waste stream if applicant demonstrates sufficient volumes and adequate facilities/markets for such material. Materials required to be recycled by state or other regulations (such as tires) are not eligible as the alternative waste stream.

Documentation Required with Building Permit

Prior to issuance of any Certificate of Occupancy, submit signed contracts for trash, recycling, and compost (or other approved waste stream) collection services. Services can be provided by one or multiple haulers. Such contracts must be for a minimum of 2 years following CO.

Resources

Use the list of [licensed commercial waste haulers](#) to find a hauler licensed in Lakewood.

Item 13 – Deconstruction

Points Possible: 3 – 12

Description

For any existing buildings on a proposed development site which need to be removed, use deconstruction instead of demolition services and donate or recycle a minimum of 50% of the materials. Materials can be reused/recycled on site, where possible. Earn 3 points for every 2,500 sf of existing buildings to be deconstructed, up to a maximum of 12 points.

Intent

Deconstruction can divert a significant amount of waste from landfills by methodically unbuilding a structure, which allows for collection of materials which can be reclaimed, reused or recycled.

Documentation Required with Major Site Plan

Indicate on an existing site conditions sheet which building(s) will be deconstructed and what contractor or hauler will be responsible for their deconstruction.

Include a table itemizing a preliminary list of the existing materials present and explain the intended destination for the materials generated. Include photographs of the materials where possible.

Documentation Required with Building Permit

Prior to issuance of any demolition or construction permit for the subject property, a deconstruction contractor licensed in Lakewood must complete a Comprehensive Waste Management Plan in accordance with Section 17.13.4 of the Lakewood Zoning Ordinance. Provide a detailed deconstruction plan indicating how deconstruction will be performed, an itemized appraisal of materials, intended destination and final receipts showing quantities of recycled materials.

Resources

- Learn more about the benefits of deconstruction from [ReSource Central](#).
- [Build Reuse](#) offers more information and resources, including a directory of member contractors.

Item 14 – Urban Heat Island Reduction

Points Possible: 5 – 20 (5 pts. for 50% of impervious surfaces covered by mitigation strategies. Additional 3 pts. per additional 5%, up to 20 pts.)

Description

Use any combination of the following strategies to reduce urban heat island effects for roof and hardscaped area: ENERGY STAR–compliant roofing products; “green” (vegetated) roof areas; reflective roofing or hardscape materials with minimum certified SRI (solar reflective index) of 29 for aged condition; open-grid pavement; or shade trees with a caliper size of 3" or greater. Solar panels and public sidewalks meeting the minimum City standard or along frontages also earning points for EDM Item 23: Enhanced Streetscapes are not counted towards the total hardscape area.

Intent

By increasing vegetation and reflective materials, less heat is absorbed by pavements, reducing the surface and air temperature. This decreases summertime energy demand, air conditioning costs, air pollution, greenhouse gas emissions, and heat-related illnesses.

Documentation Required with Major Site Plan

- On a roof plan or separate UHI sheet, include a plan drawing demonstrating where the UHI strategies are covering the roof and/or hardscaped areas. This should include the hardscape area beneath the mature canopy of new trees installed with 3"+ caliper.
- Calculation table demonstrating the total roof/hardscaped area, the roof/hardscaped area with UHI mitigation, and the percent of total roof/hardscape covered by selected measures (50% minimum)
- Landscape Plan: In the Plant List, include the size of trees to be installed and the expected mature size. Identify on the landscape plan which trees and which hardscape materials (if any) are intended to count towards UHI mitigation.
- Product specifications of ENERGY STAR roofing, pavement, and/or reflective materials (minimum 29 SRI)

Sample Calculation Table	
Total Impervious Surface Area	SUM(A:E) sf
Roof	A
Concrete	B
Asphalt	C
Paver Type 1	D
Paver Type 2	E
Total Area with UHI Mitigation	SUM(A, D, F) sf
ENERGY STAR Roof	A
Paver Type 1 (SRI 50)	D
Concrete/asphalt under mature canopy of 3"+ caliper trees	F
Percent UHI Coverage	Total Impervious Surface Area / Total Area with UHI Mitigation
Urban Heat Island Points	5 points for 50% UHI coverage, plus 3 points per additional 5%

Resources

- Use our [handouts for recommended trees](#) to help select trees with appropriate-sized canopies.
- Contact the city [Forestry Division](#) for assistance identifying trees for large-caliper transplant.
- Find [ENERGY STAR certified](#) roofing products.
- Learn about cool surfaces and available products from the [Global Cool Cities Alliance](#).
- Use [the Cool Roof Rating Council directory](#) or the Heat Island Group at Lawrence Berkeley National Laboratory's [cool roof materials database](#) for SRI ratings.

Item 15 – Low-Carbon Concrete

Points Possible: 5

Description

For all on-site exterior flatwork, use a concrete product with CO2-equivalent emissions less than or equal to the “Achievable (Low)” category of the Carbon Leadership Forum Material Baselines Report, as updated or amended. Structural uses of low-carbon concrete products are not considered under this menu item but may be eligible for points under Item 28 – Open Option.

Intent

Some of the traditional raw materials used in concrete mixes, such as Portland cement, are a significant source of carbon emissions. Alternative concrete mixes are becoming more readily available that emit less carbon, reducing the impact of hardscaped areas.

Documentation Required with Major Site Plan

- Indicate intent to procure low-carbon concrete within EDM Summary Table and identify the hardscape areas that will be low-carbon concrete on relevant site plan and civil plan sheets.

Documentation Required with Building Permit

- Submit a third-party verified Environmental Product Declaration (EPD) of the specific concrete mix proposed to be used.

Resources

- View the Carbon Leadership Forum’s [Material Baselines Report](#) to see CO2 emissions categories.
- Learn more about ways to lower the embodied carbon of concrete from the Rocky Mountain Institute’s [Concrete Solutions Guide](#).
- Look up specific concrete mixes in the National Ready-Mix Concrete Association (NRMCA)’s database of [Environmental Product Declarations](#)

Item 16 – Reclaimed and Recycled Materials

Points Possible: 5

Description

Incorporate a minimum of 10% reclaimed and/or recycled materials into the exterior areas of the site, such as building facades, open space hardscape, or other similar areas. Materials may be reclaimed from deconstruction of existing buildings on site, purchased from a dealer or organization specializing in reclaimed building materials, or new products made with recycled content. Specific materials are subject to approval by the Planning Department and must comply with any other applicable design standards.

Intent

Reclaimed and recycled building materials help keep reusable products out of landfills, and create an end market for those materials produced by deconstruction and C&D recycling.

Documentation Required with Major Site Plan

- Include examples of reclaimed and recycled exterior materials on the Color/Materials Board.
- For reclaimed materials, provide written and photographic documentation of the source of reclaimed materials and identify such materials on relevant plan sheets (site plan, landscape plan, and/or elevations).
- For new materials made with recycled content, provide product specification or third-party verified Environmental Product Declarations (EPD) indicating percentage of recycled content.

Sample Calculation Table

Total Façade and Hardscape Surface Area	A
Reclaimed or Recycled Material 1:	
Material 1 Area	B
Material 1 Recycled Content (reclaimed = 100%; recycled = per EPD)	C
Material 1 Adjusted Reclaimed or Recycled	$B \times C = D$
Reclaimed or Recycled Material 2:	
Area with Material 2	E
Material 2 Recycled Content (reclaimed = 100%; recycled = per EPD)	F
Material 2 Adjusted Reclaimed or Recycled <i>(repeat for each reclaimed or recycled material)</i>	$E \times F = G$
All Hardscape and Façade Surface Area with Reclaimed or Recycled Materials	$D + G = H$
% Surface Area with Reclaimed or Recycled Materials	$H / A =$ min 10%
Total Number of Landscape Features/Amenities	I
Reclaimed or Recycled Material 3:	
Number of Features with Material 3	J
Material 3 Recycled Content (reclaimed = 100%; recycled = per EPD)	K
Material 3 Adjusted Reclaimed or Recycled	$J \times K = L$
% Landscape Features with Reclaimed or Recycled Materials	$L / I =$ min 10%

Documentation Required with Building Permit

- Confirm that materials to be used match the approved Major Site Plan.
- If any documentation for reclaimed materials was not already provided (for example, due to timing of demolition/deconstruction), submit it at this time.

Resources

- The Colorado State Forest Service maintains a [database of Colorado companies](#) which provide products crafted of reclaimed wood from forest management activities
- [Resource Central](#) is one non-profit which accepts donated building materials from deconstruction and sells them for reuse. Habitat for Humanity [ReStore](#) is another.
- Many additional companies specializing in salvaged and repurposed building materials can be found online.

Item 17 – Adaptive Reuse

Points Possible: 10 – 15 (15 points for full building reuse; 10 points for minimum 50% building reuse plus 1 additional point per additional 10% of building reused)

Description

Repurpose existing primary structures for new uses rather than demolishing and constructing new buildings to help preserve the urban fabric of neighborhoods. Points may be earned for either:

- Full Building Reuse - all exterior walls are maintained as part of the proposed development; or,
- Partial Building Reuse - a minimum of 50% of the street-facing façade of the existing primary building structure is maintained as part of the street-facing façade of the proposed development.

Up to 5 bonus points are awarded for eligible structures that receive concurrent historic landmark designation. Designated landmarks may have opportunities for additional financial benefits such as grants and tax credits (consult the [State Historic Preservation Office](#) to learn about available funding).

Intent

Keeping existing structures intact helps preserve the character of Lakewood neighborhoods and creates unique places that reflect the local history and culture.

Documentation Required with Major Site Plan

- Clearly show on the site plan, landscape plan, and architectural elevations how the existing building(s) will be incorporated into the design of the proposed development.
- Include an additional sheet within the plan set with details, photographs, and a written narrative describing the approach to adaptive reuse of the existing building(s).
- Submit a letter of opinion from a structural engineer licensed in the state of Colorado regarding the suitability of the building(s) for the proposed reuse. Any reuse must meet the International Existing Building Code (IEBC), as adopted or amended in Title 14 of the LMC.

Documentation Required with Building Permit

- Confirm in construction plans that the existing building(s) will be adapted as approved in the Major Site Plan, and in conformance with all local building codes.

Resources

- Get ideas for [creative preservation](#) from Colorado Preservation Inc.
- See the [Historic Preservation Plan](#) for more information about local landmark designation. Contact Matthew Seubert at matseu@lakewood.org or Shannon Terrell at shater@lakewood.org with questions.

Item 18 – Multimodal Transportation Assessment – Residential

Points Possible: 2

Description

Identify available pedestrian, bicycle, and transit connections from the site to essential destinations to inform wayfinding, connectivity with the existing transportation network, and other infrastructure improvements.

Intent

Evaluating multimodal connections early in the design process can help identify infrastructure and community needs that may be addressed as part of the proposed development to minimize impact on the surrounding neighborhood and ensure adequate access for future residents.

Documentation Required with Major Site Plan

- Provide a sheet within the plan set indicating multimodal routes to essential destinations within a 0.5-mile radius for suburban and urban zone district contexts and a 0.2-mile radius for transit zone district contexts, or to the nearest location of each essential destination if none exists within the stated radius. Essential destinations to be identified include: grocery stores, parks, schools, libraries, and transit stations/bus stops.
- Identify transit route and bike route numbers.
- Include a note explaining how the project facilitates connections to the identified destinations and to existing and planned multimodal infrastructure.

Resources

- Refer to the [Lakewood Bicycle System Master Plan](#) to identify existing and future bicycle infrastructure.
- The [RTD System Map](#) shows bus and light rail routes.

Item 19 – Multimodal Transportation Assessment – Non-Residential

Points Possible: 2

Description

Identify available pedestrian, bicycle, and transit connections to the site to inform wayfinding, connectivity with the existing transportation network, and other infrastructure improvements.

Intent

Evaluating multimodal connections early in the design process can help identify infrastructure and community needs that may be addressed as part of the proposed development to minimize impact on the surrounding neighborhood and ensure adequate and equitable access to the building.

Documentation Required with Major Site Plan

- Provide a plan sheet identifying multimodal routes to the site from within a 0.5-mile radius for suburban and urban zone district contexts and a 0.2-mile radius for transit zone district contexts. Consider how people of all abilities would access the site as pedestrians, by bicycle, and by transit from the surrounding area, such as from transit stops, neighborhoods, and trails.
- Identify transit route and bike route numbers.
- Include narrative explaining how the project facilitates connections to and through the site.

Resources

- Refer to the [Lakewood Bicycle System Master Plan](#) to identify existing and future bike paths.
- The [RTD System Map](#) shows bus and light rail routes.

Item 20 – Bike amenities

Points Possible: 2-5 (1 point per amenity; minimum 2 required)

Description

Provide bike amenities that are available to the community, such as fix-it stations with air pumps, bicycle vending machines, covered bicycle parking, e-bike charging station, designated space for dock less bike share parking, water bottle refill stations, custom bike racks in areas of the City where a specific streetscape design package or adopted design guidelines are implemented, etc. Amenities must be in addition to the short- and long-term bicycle parking requirements in [Article 8](#) of the Zoning Ordinance.

Intent

Bicycle amenities support bicycle commuting, which promotes healthy living and reduces air pollution, greenhouse gas emissions, and vehicle traffic.

Documentation Required with Major Site Plan

- List the bicycle amenities in the EDM Summary Table on the cover sheet.
- Identify bicycle amenities on the site and landscape plan sheets.
- Include product specifications of bicycle amenities on the site detail sheets, along with a note describing the proposed maintenance plan.

Item 21 – Public EV Charging Stations

Points Possible: 5 – 30

Description

Incorporate publicly accessible EV charging stations into the project’s parking areas in addition to the minimum EV parking requirements in [Article 8](#) of the Zoning Ordinance. All charging stations must have universal charging sockets and be at least dual-port (2 parking spaces) to be eligible for points. Points are achieved according to the table at right. Signage must be installed at each charging space to indicate that charging is available for public use and listing any applicable fees or time limits for charging.

Point Availability	
Charger Type	Points
Any combination of charger types	30 maximum
Level 2 (AC 240-volt) or DCFC (<50 kW)	5 per dual-port station
DCFC (50 kW – 99 kW)	10 per dual-port station
DCFC (100+ kW)	15 per dual-port station

Charging stations cannot double count towards Item 22 – Above-Code EV Charging Stations.

Intent

EV charging infrastructure supports use of fossil-fuel free vehicles, reduces tailpipe emissions and improves air quality.

Documentation Required with Major Site Plan

- Indicate designated public EV charging spaces and signage on the site plan.
- Provide EV charging infrastructure product specifications on detail sheets.
- Include detail of signage on detail sheets.

Resources

- Refer to this [Plug-In Electric Vehicle Handbook for Public Charging Station Hosts](#) for guidance.
- [Xcel Energy EV resources](#) includes rebates and incentives for residential and non-residential supply infrastructure.
- Potential grants and vendor list are available through [Charge Ahead Colorado](#).

Item 22 – Above-code EV Charging Stations

Points Possible: 5 – 30

Description

Incorporate EV charging stations into the project’s parking areas in addition to the minimum EV parking requirements in [Article 8](#) of the Zoning Ordinance. These spaces are not required to be publicly available, and may be reserved for building residents, tenants, and employees. Five (5) points are achieved for each universal dual-port charging station (2 parking spaces) regardless of charger type, up to a maximum of 30 points. Charging stations cannot double count towards Item 21 – Public EV Charging Stations.

Intent

EV charging infrastructure supports the use of fossil-fuel free vehicles, which reduces tailpipe emissions and improves air quality.

Documentation Required with Major Site Plan

- Indicate designated public EV charging spaces and signage on the site plan.
- Provide EV charging infrastructure product specifications on the site detail sheets.
- Include detail of signage on detail sheets.

Documentation Required with Building Permit

- Include product specifications and demonstrate how all relevant building code requirements are being met.

Resources

- [Xcel Energy EV resources](#), including rebates and incentives for residential and non-residential supply infrastructure
- Refer to this [Plug-In Electric Vehicle Handbook for Public Charging Station Hosts](#) for guidance.
- Potential grants and vendor list available through [Charge Ahead Colorado](#).

Item 23 – Enhanced Streetscapes ★

Points Possible: 5 – 40

Description

Provide enhanced streetscape design in support of and consistent with citywide, neighborhood, or strategic plans within Growth Areas as identified in the [Comprehensive Plan](#) (see chapter 3 page 21). At a minimum, the enhanced design must include a minimum of four (4) of the following elements:

1. Street trees in addition to those required elsewhere in the zoning code
2. Shrub/perennial beds within the tree lawn
3. Masonry seat walls
4. Pedestrian-scale lighting
5. Transit stop improvements
6. Pedestrian amenities such as trash receptacles, benches, etc.
7. Placemaking features as identified in specific area plans.

Point Availability	
Length of Enhanced Frontage	Points
Up to 50 linear feet	5 points
50 to 400 linear feet	1 point per 10 feet
Over 400 linear feet	40 points
In areas with adopted design guidelines:	5 bonus points

★ High-impact item; prerequisite for developments over 150,000 sf.

Examples of additional types of streetscape elements which may be considered on a case-by-case basis include enhanced pedestrian plaza areas and integrated stormwater quality design, such as bioswales or rain gardens.

Enhanced design must be implemented along entire frontages to prevent a piecemealed streetscape. Streetscape elements should be implemented on-site as much as possible. Any elements proposed within the public right-of-way may be limited and are subject to approval by the Public Works Department. A Revocable License Agreement may be required for elements within the right-of-way. Subsequent property owners and/or management associations will be responsible for ongoing maintenance of enhanced streetscape design elements.

Intent

Enhanced streetscape design creates an inviting pedestrian realm, encourages active modes of transportation, and contributes to a sense of place.

Documentation Required with Major Site Plan

- In the EDM Summary Table, identify for which frontage(s) the enhanced streetscape is proposed, the total length of enhanced streetscape, and the specific design elements included in the proposed streetscape.
- With the landscape plan or on a separate sheet in the plan set, include a detail site plan and cross-section of the proposed streetscape design, clearly indicating which elements are included in the design and demonstrating how those elements are above and beyond the minimum code requirements.
- Include product specifications for each element on the site detail sheets, along with notes describing the proposed maintenance plan (maintenance schedule, responsible party, etc.).
- If required, a Revocable License Agreement for elements within the right-of-way must be approved prior to Site Plan approval.

Documentation Required with Civil Plans

- Include details of any features proposed within the public right-of-way for approval by the Public Works Department. Final design must be reflected in both site plan and civil plan sets.

Resources

- The City of Lakewood has adopted Implementation Plans. These include wayfinding, placemaking, and urban design for specific areas of the city.

Item 24 – Social Connection Amenities ★

Points Possible: 2 – 20

Description

Incorporate social amenities that foster community interaction and available for use by the public, in addition to any other development requirements. Points are achieved based on the size of the amenities provided, as shown in the table to the right. All amenities should be built of appropriate durable materials to withstand outdoor exposure. Proposed developments over 100,000 square feet which select this item must achieve a minimum of 5 points. The amenities listed below are provided as examples.

Point Availability	
Size of Amenity	Points
Small	1 per amenity
Medium	2 per amenity
Large	5 per amenity
Any combination of amenities	20 maximum

★ High-impact item; prerequisite for developments over 150,000 sf.

Small amenities may include little free libraries, community bulletin boards, picnic tables, permanent games such as corn hole, ping pong, or bocce, and similar types of low-cost, small-footprint features.

Medium amenities may include outdoor exercise equipment, shade structures, water bottle filling stations, musical instruments, game tables, dog parks, and similar features with a larger footprint or higher installation cost.

Large amenities may include community meeting rooms, outdoor classrooms, playground equipment, basketball or pickleball courts, and similar features with a large investment and which may attract people from the surrounding neighborhood.

Other public recreation amenities may also be considered under Item 28: Open Option in collaboration with Community Resources staff. These may include public-private partnerships, easements, or credits towards parkland dedication.

Intent

Social connection amenities support community interaction and cohesion, which in turn support health as well as local economic development.

Documentation Required with the Major Site Plan

- List the included amenities in the EDM Summary Table
- Clearly identify the amenities on the site plan and landscape plan sheets
- Include product specifications with the site detail sheets, along with notes describing the proposed maintenance plan (maintenance schedule, responsible party, etc.)

Resources

- Get ideas for placemaking from the [Project for Public Spaces](#).
- “Third places” help [build community](#) and support health.

Item 25 – Public Art

Points Possible: 2 – 25

Description

Incorporate public art into the development. The art must be permanent, viewable/accessible from public or semi-public areas, and designed with durable materials intended to withstand outdoor exposure. Consult with the city's Arts Programming Curator and Comprehensive Planning & Research staff to receive guidelines for the acquisition of public art or a template RFP/RFQ for public art on the site. Artwork acquisition and/or RFP/RFQ must be approved by the City before issuing. Points are achieved based on the art budget (inclusive of artist fees, materials, and installation) as shown in the table to the right. Developments over 100,000 square feet which select this item must include a minimum art budget of \$15,000. Any artwork within the public right-of-way will require approval by the Public Works Department and a Revocable License Agreement.

Point Availability	
Public Art Budget	Points
\$5,000	2
\$10,000	4
\$15,000	8
\$25,000	12
\$50,000	15
\$100,000	20
\$150,000	25
Bonus Opportunities	Points
Designated arts or creative district	+3
Adjacent to the ArtLine	+5
(Bonus points cannot be combined)	

Intent

Public art installations support the city's public art goals and community identity.

Documentation Required with Major Site Plan

- In the EDM Summary Table, note the proposed public art budget for the project and include a short description of the vision.
- Identify the designated public art location(s) on the site and landscape plans and building elevations, if applicable.
- If available, include detail site plan and elevations of the proposed artwork on the detail sheets.
- Prior to Site Plan approval, written approval of the art acquisition and/or RFP/RFQ for public art must be provided from the Arts Programming Curator.

Documentation Required with Building Permit

- Submit the signed contract for acquisition of the selected artwork, along with final drawings, timeline for installation, and a maintenance plan including proposed maintenance schedule, responsible party, etc.

Resources

- City of Lakewood Arts Programming Curator: Laine Godsey, 303-987-7844, laigod@lakewood.org
- For projects in the 40W Arts District: City of Lakewood Principal Planner: Alexis Moore, 303-987-7503, alemoo@lakewood.org
- Review the [Public Art Master Plan](#).

Item 26 – Adaptability / Universal Design

Points Possible: 5

Description

Although traditionally associated with physical disabilities, universal design features do not detract from the aesthetic appeal of a home and are convenient to everyone, including people with arms full of groceries, parents with strollers, young children navigating their home environment, and people with temporary injuries or illness. Provide a minimum of 15% of housing units designed to accommodate people of all ages and ability levels in addition to the minimum number of accessible units required by law. Features which may be considered as part of universal design include: no-step entrances; lever-style door handles; flush threshold showers; reinforced bathroom walls to accommodate future installation of grab bars; kitchen cabinetry that allows a person to work in a seated position; rocker-style light switches; light switches and outlets placed at heights convenient from a seated position.

Additional points may be requested through Item 28: Open Option for implementing universal design principles throughout the development, including workspaces and public areas.

Intent

Universal design creates inclusive spaces that accommodate people of any age or ability level and easily adapt to changing life situations.

Documentation Required with Major Site Plan

- In the EDM Summary Table on the cover, list which universal design features are proposed and how many units will include those features.
- Include a typical floorplan sheet in the plan set that identifies the universal design features.
- Include a calculation table demonstrating the percentage of units with universal design features.

Total # of units	A
Accessible # units per C.R.S.	B
Additional # units with Universal Design	C
Percentage of units with Universal Design	$C / A =$ min 15%

Documentation Required with Building Permit

- Include a table listing the universal design features incorporated into the required units, and the location within the construction plan set for details of each item.

Resources

- Learn the difference between accessibility and universal design.
- Get more specific suggestions for universal design from the Center for Inclusive Design and Environmental Access.

Item 27 – On-site Food Production

Points Possible: 15

Description

Install on-site food plots for vegetable gardens and fruit trees for a minimum of 10% of residential dwelling units (or equivalent for nonresidential uses). The combined area of the plots must equal a minimum of 20 square feet of food production area per dwelling unit. Provide evidence that the garden plots are easily accessible, of appropriate slope, contain appropriate soil for food production, receive adequate sunlight (min. 6 hours of full sun), and have an available water source for irrigation (exempt from water budget calculations).

Intent

Fostering local food production improves access to healthy food, supporting the city’s community health and local economy goals.

Documentation Required with Major Site Plan

- In EDM Summary Table, note number of plots and total square footage of food production area.
- Include garden location on site plan and landscape plan sheets.
- Within the landscape plan or on an additional sheet, include the following:
 1. Detail plan of the garden area identifying the plot size, detail of plots if raised beds, water source, fruit trees, and any other features
 2. Brief narrative describing the garden's accessibility, slope, soil, average daily sunlight during the growing season, and the available water source (exempt from water budget)
 3. Table showing number of units, number of food plots, percent of units with access to a food plot, total area of plots, and average plot area.

Total # units (or commercial equivalent)	A
Number of garden plots	B
Percentage of units with access to a plot	$B / A =$ min. 10%
Total food production area (sf)	C
Food production area per unit (sf)	$C / B =$ min. 20

Resources

- CSU Extension resources on local food production

Item 28 – Open Option

Points Possible: 2 – 150

Description

Provide sustainable development features that further the city’s sustainability goals in addition to any other applicable code requirements or regulations. Requests for 2 to 14 points may be approved by the Planning Director; requests for 15 to 150 points must be approved by the Planning Commission.

Intent

The open option enables the applicant to propose creative and innovative community or environmental sustainability features as part of the development.

Documentation Required

- With Major Site Plan submittal, include a written request for consideration of an open option item. This request must include: a description of the proposed feature(s); how the request aligns with city goals and policies; a cost estimate of the proposed open option item; the number of points proposed; and any documentation necessary to substantiate the claimed benefits.
- Upon approval, documentation must be included where relevant within the site plan set, civil plan set, building permit, and/or construction documents.