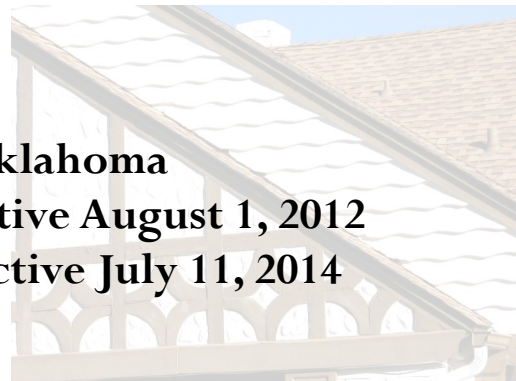
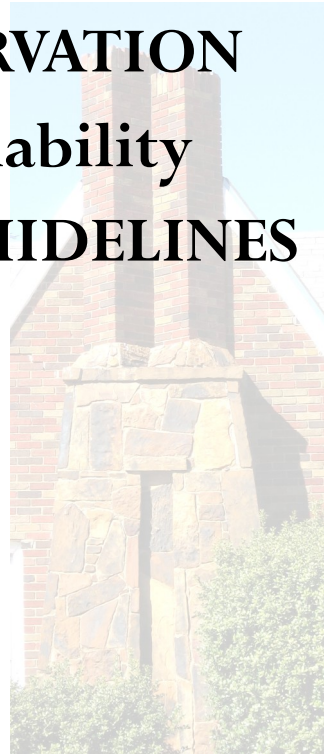




**OKLAHOMA CITY  
HISTORIC PRESERVATION  
Design & Sustainability**

**STANDARDS and GUIDELINES**



**Oklahoma City, Oklahoma  
Adopted July 31, 2012 Effective August 1, 2012  
Revised June 10, 2014, Effective July 11, 2014**

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# Oklahoma City Historic Preservation Design & Sustainability Standards and Guidelines

## Oklahoma City, Oklahoma

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This printed document represents the Oklahoma City Historic Preservation Design & Sustainability Standards and Guidelines (also known as “the Standards and Guidelines”) as adopted by the Oklahoma City Council on July 31, 2012 with an effective date of August 1, 2012. The Standards and Guidelines may be revised from time to time. The most current version of the Standards and Guidelines is available from The City of Oklahoma City through the City Clerk’s Office.

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## ***Setting the Foundation:***

### **Chapter 1**

## **INTRODUCTION AND ORIENTATION**

### **1.1 HISTORIC PRESERVATION AND DESIGN STANDARDS AND GUIDELINES**

Thousands of cities and towns across the nation protect historic districts and landmarks and promote historic preservation as an important tool for improving community livability and quality of life. Preservation activity in older and historic districts helps to promote civic pride, improves property values, stabilizes the inner-city, creates skilled jobs, increases sales tax revenues, and minimizes negative impacts on the environment by retaining existing buildings and building materials.

The historic districts in Oklahoma City are distinctive areas, each with its own unique character. Each historic district is distinguished by its' buildings, streets, parks and parkways, trees, architectural design and landscape features. Some districts are large with hundreds of properties; some are smaller. Some districts contain grand ornate buildings, while others contain more modest structures. Each district serves as a legacy, linking present and future generations with their heritage, and providing diversity to the city's appearance, and character.

The City's historic preservation ordinance acknowledges that historic districts and landmarks are valuable assets to the city. The ordinance recognizes that change is important to the community's evolution and an indication of healthy, vital neighborhoods occupied by residents proud of their neighborhood and its history. Development and investment that preserve the historic character of Oklahoma City's historic properties and districts, while also enhancing livability, are encouraged.

### **1.2 DESIGNATION AND REVIEW PROCESS**

Designation of Historic Preservation (HP) and Historic Landmark (HL) zoned districts and properties may be established by City Council. Careful research and evaluation of a district's or property's historical significance is required to support the designation process. Historic districts – the first of which for Oklahoma City was designated in 1969 – are created to protect the existing character and enhance or stabilize the existing condition of the district and the surrounding area. The Historic Preservation (HP) and Historic Landmark (HL) zoning process protects historic districts and properties from unmanaged, inappropriate change by a thorough review process based on the Municipal Code (Chapter 59) and these Preservation Standards and Guidelines.

The Oklahoma City Historic Preservation Commission (HPC) serves both the general public, as stewards of the special historic places and areas in the City, and the owners of properties zoned HP or HL when planning major repairs, alterations or new construction. The HPC members are appointed by the Mayor with consent and approval of the City Council. By ordinance, the Commissioners should

have demonstrated special interest; experience or education in history, architecture and the heritage of Oklahoma City; and several members must be professionals within specialized fields and related to historic preservation. The HPC has several powers and responsibilities including recommending to the City Council the designation of landmarks and historic districts; granting requests for proposed changes to the exteriors of buildings and properties; conducting educational programs on historic preservation; cooperating with local, state and federal governments in pursuance of its responsibilities; and conducting meetings or hearings necessary to carry out its purpose. Historic Preservation and Historic Landmark zoned districts and properties are so designated to guide and not to prevent change. The HPC and Planning Department staff provide assistance to property owners and tenants in shaping changes and improvements to historic properties while meeting the standards of City ordinances and these Standards and Guidelines. The Municipal Code establishes a process that ensures changes to HP or HL zoned properties are consistent with the spirit and character of the historic district and the individual properties while meeting owners' and residents' contemporary needs. In the preservation design and review process, plans are examined and evaluated before construction work begins.

Neither the HP or HL sections of the Municipal Code nor these Standards and Guidelines require property owners to make any changes to their homes or buildings. They do not apply to any interior work or alterations, nor to Ordinary Maintenance and Repair, which may include limited (less than 50% of any feature or material on any one side of the building) replacement of exterior materials or features that does not constitute a change in appearance or materials (see Chapter 3). However, all major repairs (more than 50% of any feature or component on any one side of the building) that require material replacement, exterior alterations, demolition, new construction, additions, certain landscape changes or relocation of buildings are subject to evaluation and HPC or administrative staff approval as authorized by the Municipal Code.

The Planning Department staff provide consultation and assistance to property owners about proposed changes to their properties or buildings. In the early planning stages of a project, owners are encouraged to contact staff regarding any questions or concerns. Staff can assist by interpreting and explaining the ordinance and these Standards and Guidelines, make on site visits, and provide technical assistance for solving problems. For assistance call (405) 297-1831.

### **Preservation Standards and Guidelines**

A published set of design guidelines was completed in 2002 to provide an easy to understand, common sense approach to the appropriate preservation and enhancements of historic properties, buildings and districts. In 2010, Oklahoma City received a grant from the U.S. Department of Energy to revise the standards and guidelines to include an expanded discussion on sustainability and energy efficiency. These Standards and Guidelines are the result of this effort and may require amendment from time to time. These Standards and Guidelines emphasize the importance of protecting and maintaining historic properties, buildings and districts.

The Standards and Guidelines promote the repair of historical materials whenever possible, rather than replacement. They also provide guidance for appropriate and cost-effective maintenance of historic buildings.



**Certificate of Appropriateness Application and Review**

Following consultation with Planning Department staff and either a review by the HPC or approval by administrative staff, as authorized by the Municipal Code, a Certificate of Appropriateness (CA) may be issued to confirm that: 1) the review has occurred and 2) the proposed work is appropriate and meets the Standards and Guidelines. A CA also provides permission to proceed with approved work. A CA may not be necessary for maintenance work that includes repair or limited replacement when there is no change in design, materials, color in certain instances or general appearance (see Chapter 2). A CA must be obtained for all other projects that affect the exterior surfaces or exterior spaces of HP or HL zoned historic districts and properties. A Certificate of Appropriateness (CA) application form can be obtained on line from the City's website and from the Planning Department (405-297-1831). A description of the proposed work, including related drawings and photographs depicting the proposed work, are usually required as part of the CA application. Many applications can be reviewed and approved by Planning Department staff through an administrative process. Other projects are reviewed by the HPC at a public hearing that is held in the Municipal Building (also known as City Hall). These hearings are held monthly.

**1.3 HOW TO USE THESE STANDARDS AND GUIDELINES**

Property owners, tenants, architects, building designers, developers, contractors, and real estate agents should use these Standards and Guidelines when considering any project that will affect the exterior elements of a property zoned HP or HL. The Standards and Guidelines provide guidance for an appropriate direction for project planning. For any project that is subject to review by the HPC or Planning Department staff, the applicant should refer to the Standards and Guidelines at the beginning of the planning process to avoid efforts that later may prove to be inappropriate and are ultimately denied by the HPC.

A "standard" is a rule or principle that is used as a basis for judgment and a "guideline" is a policy or recommended approach. As applied in this document, a standard is established by mandatory terms, such as "shall" or "will" and guidelines are established by permissive terms, such as "should" or "may."

The HPC will also use these Standards and Guidelines in its review of proposed projects for HP and HL zoned districts and properties. In each case, the HPC will conduct its review and make its decision based on the merits of that particular case. Consistency in decision making is achieved by individual consideration of the history associated with each property and applying the Standards and Guidelines in a manner that relates to that specific history. In evaluating the appropriateness of a project, the Commission will determine whether:

1. The proposed work complies with the criteria in the Municipal Code and these Standards and Guidelines.
2. The design integrity of the individual historic building or property is preserved.
3. The design integrity and overall character of the historic district is preserved.
4. New buildings are designed to be compatible with surrounding historic buildings and properties.
5. New additions are designed to be compatible with the specific property and building to which they are added.

Each chapter and section of these Standards and Guidelines is organized to provide basic preservation and sustainability advice and specific regulatory principles, requirements and recommendations. Each design chapter section is described with a broad policy statement followed by justification of this policy on both design and sustainability principles. Each design guideline subsection is then presented with the following levels of review:

⇒ **Maintenance**

Much work can be done to preserve and maintain buildings and properties zoned Historic Preservation or Historic Landmark without review or having to file an application for Certificate of Appropriateness. The maintenance work contained in these Standards and Guidelines may also be known by the definition contained in the Municipal Code as “Ordinary Maintenance and Repair,” as further identified in these Standards and Guidelines, and including regular maintenance of a building and minor repairs (repair by replacement limited to less than 50% of any one feature or component on any one side of a building) in keeping with the circumstances and details and materials of the original design and materials. Such activities will not require a Certificate of Appropriateness for administrative staff approval or Commission approval.

⇒ **Administrative Review**

Many actions involving changes to the exterior of buildings and properties in the Historic Preservation and Historic Landmark zoned areas may be reviewed and receive administrative staff approval. Such review and approval can typically be provided in a number of days as long as applications are complete, including attachments, and as long as such actions are authorized by the Municipal Code.

⇒ **Historic Preservation Commission Review**

All other projects require review by the HPC.

Property owners are encouraged to contact the Planning Department staff if they have any questions concerning the need for a Certificate of Appropriateness and the level of review required for their specific project.



*Maintenance, repair and rehabilitation of buildings in Oklahoma City that are zoned Historic Preservation (HP) or Historic Landmark (HL) will have different levels of review depending on the extent of proposed changes (237 NW 35th Street).*

## 1.4 HISTORIC PRESERVATION AND SUSTAINABILITY

### Introduction

Many cities across the country have adopted design guidelines to promote the preservation of historic buildings and the retention of their original materials. In the sense that preservation discourages the replacement of original architectural features, design guidelines typically are inherently “green.” While design guidelines imply sustainability, making direct links between the two is now the approach of a number of community preservation efforts. Design guidelines embrace the tenets of re-use and maintenance, thus preserving historic buildings and protecting existing resources from depletion. Preservation’s traditional focus on the aesthetic and cultural significance of historic buildings is expanding to highlight the inherent energy-efficient values of such properties as well.

### Sustainable Development

The word “sustainability” has become a common part of our modern language. One familiar definition that was popularized in 1987 by a publication of the United Nations Commission on Environment and Development is “*Sustainable development meets the needs of the present without compromising the ability of future generations to meet their own needs.*” The concept of this definition is that sustainable development requires consideration of the finite supply of resources.

### Working with Nature: Site Orientation

Historic buildings are often as energy-efficient as new ones. Buildings constructed before World War II were designed, constructed, and sited to achieve optimum ventilation, insulation, and use of daylight. Over the past sixty years, as electricity, synthetic insulation, and central heating and air conditioning systems became standard installations in modern construction, architectural design no longer required attention to the natural environment. Quality and longevity of building materials also became less important, as these modern conveniences could control the interior climate of buildings and materials were readily available to build anew.



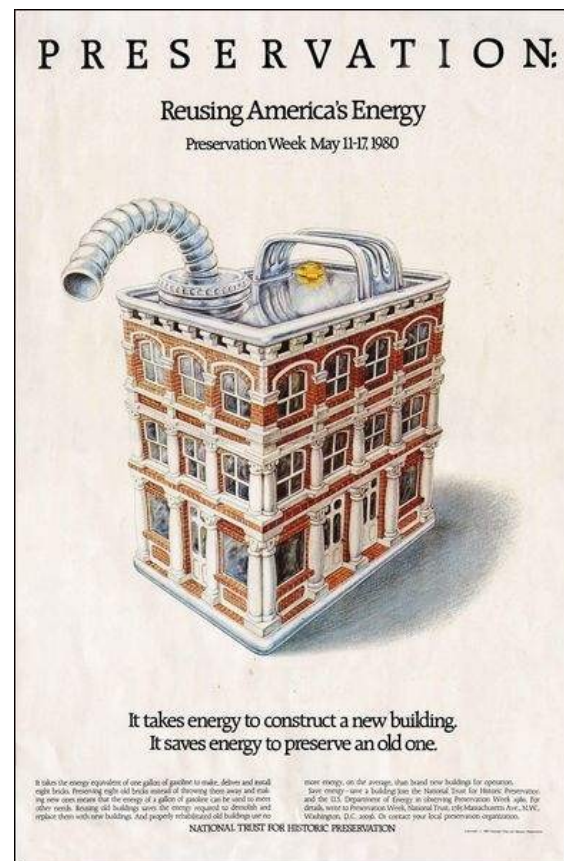
*Dwellings in the city's historic districts were designed with inherent energy conservation methods in the days before air conditioning. This included wide roof eaves, broad porches, windows for cross ventilation (such as double hung windows) and awnings for window shade. (416 NW 22nd Street)*

### Embodied Energy

One of the most important aspects of preserving older buildings is the concept of the embodied energy represented. An existing building represents a cumulative amount of energy, compounded over the course of its construction. From the extraction of raw natural materials, to their transportation, manufacture and distribution, to the physical act of construction of the building, energy is spent. This energy, in the inert form of a building, remains in place as long as the building stands. If demolished, the building's embodied energy is lost, and additional energy has been spent to raze it. Loading and hauling the building debris to a landfill requires additional energy and loss of resources.

Construction of a new building on an empty lot or on a new parcel of undeveloped land, requires a new expense of energy, beginning with the mining of natural materials embodied in the earth. While many architects, designers and developers today tout the “green” practices and materials used in constructing contemporary buildings, this frame of mind overlooks the fiscal benefits and resource conservation of re-using existing buildings. Furthermore, it is estimated that a new, energy-efficient building will take 65 years to save back the embodied energy lost in demolishing an existing building.<sup>1</sup> Re-using an existing building embraces the philosophy of recycling, making it the greenest choice. Thus, embodied energy can be viewed as investment in a building. Retaining and preserving this investment is also the most fiscally responsible choice for a community.

*The concept of embodied energy was expressed as early as 1980 in this poster by the National Trust for Historic Preservation.*



1. “It’s Easy Being Green: Sustainability in Bayfield From a Historic Preservation Perspective,” (Bayfield, WI: City of Bayfield, WI, 2002), 8.

### **Sprawl & Waste**

Re-using older buildings not only sustains their embodied energy, it reduces waste and sprawl. Existing landfills eventually reach their capacity, and choosing locations for new ones is often controversial. It is estimated the building debris from demolition constitutes one-third of landfill material.<sup>2</sup> Over the last 30 years, landfills have been filling to capacity and have been “retired.” Of the 20,000 landfills in use in 1978, approximately 25% were still taking in refuse ten years later. Of those landfills, the EPA estimated that 1,234 were still open in 2008. The U.S. generated 143.5 million tons of building-related construction and demolition debris in 2008, but only 28% (40.2 million tons) was reused, recycled or sent to waste-to-energy facilities.<sup>2</sup> Demolition can be costly. In 2010, razing a residential building cost between \$6 and \$15 per square foot. Beyond the costs of demolition, the cost of hauling and dumping building debris in a landfill is calculated by weight.

Limiting sprawl benefits a municipality by containing the need for expanding infrastructure, including streets, water and power lines, schools, and emergency and law enforcement services. Demolition of a historic structure is always discouraged, and these design guidelines require review of a proposed demolition by the Historic Preservation Commission. In the past, preservation guidelines were mainly attuned to the collective historic integrity of a district, citing a demolition as detrimental to the overall character of the neighborhood. As municipalities focus on the principles that guide sustainability, design guidelines reinforce the premise that demolition also squanders embodied energy, produces waste and requires the use of new resources to build anew. Studies have shown that the infrastructure and services associated with building 100 average-priced homes is three times the revenue produced by the new properties over a twenty-year period.<sup>4</sup> Furthermore, the open space saved from such development will actually contribute more to local tax revenue as farm or forest than the cost of services if the land is developed.<sup>3</sup>

*Debris from demolished buildings accounts for approximately one-third of the volume in landfills.*



2. “Construction and Debris (C & D) Waste Facts”, under Deconstruction of C & D Waste at <http://www.advancedrestoration.com>.

3. *SEL C Report on Growth in Middle Tennessee*, 14, at [http://www.southernenvironment.org/Cases/smart\\_growth\\_tn/growing\\_report.shtml](http://www.southernenvironment.org/Cases/smart_growth_tn/growing_report.shtml) .

## 1.5 IMPROVING THE ENERGY EFFICIENCY OF OLDER BUILDINGS

Historic buildings are often as energy-efficient as new ones. Data from the U.S. Energy Information Agency found that buildings constructed before 1920 are actually more energy-efficient than those built at any time until the past decade when home builders began a concerted effort of building more energy-efficient buildings. Yet, contrary to common thought, these newer buildings use more energy. When buildings are designed to take advantage of the natural benefits of their site, energy use can be reduced by 50% or more.<sup>4</sup>

In Oklahoma City, 49% of homes were constructed before 1970.<sup>5</sup> The high quality of older buildings allows them to be readily adapted to the needs and requirements of twenty-first century occupants. Issues regarding the rehabilitation of older houses include updating mechanical features such as electrical, plumbing and HVAC, weatherization to conserve energy and retrofitting houses to accommodate smaller families.

Many houses in Oklahoma City are now 100 years old or older, such as in Mesta Park, established in 1902. Thousands more, such as the city's fine collection of Tudor Revival dwellings, will reach this milestone during the next two decades. During the past century, the coal-fired furnaces in these dwellings have generally been replaced with furnaces using natural gas. Original knob and tube electrical wiring has largely been replaced with modern wiring, and central air conditioning has been installed. Basements, crawl spaces, and attics generally afford room for continued retrofitting of modern mechanical upgrades. With proper care, these buildings can last another century and more.

### **Inherent energy efficiency of older buildings**

Building design features that inherently incorporate the advantages of the natural environment are derived from site orientation, construction, and details of architectural components. Banks of windows on a south elevation, for example, optimize natural light on the interior and also passive solar heat during winter months. During summer months, these windows could be shaded with removable awnings to block heat. Additionally, shade trees can be added to the landscaping to create shade. Evergreen hedges can be added on north-western exposures to serve as wind blocks during winter. In construction, thick masonry walls of older buildings help retain interior heat in the winter and also help lengthen the time it takes for summer heat to penetrate the building. Architectural elements with form-to-function design include operable transoms and high ceilings, both allowing the escape of hot air. Several design guidelines specifically address the advantages of how historic buildings relate to their site and natural setting.

4. "Better Buildings," City of Charleston, South Carolina, 29.

5. Oklahoma City, Oklahoma QuickLinks, People QuickLinks, "Housing Characteristics, at website <http://quickfacts.census.gov/qfd/states/40/4055000lk.html>



This Colonial Revival style house at 617 NW 14th Street illustrates several features that minimize energy use and cost:

1. Light colored exterior reflects the sun's heat.
2. Operable windows allow for natural ventilation.
3. Generous floor to ceiling height allows heat to rise up and away from living space.
4. Porch provides shade across entire facade.
5. Trees provide shade.
6. Wide eaves provide shade.

This Tudor Revival style house at 705 NW 42nd Street illustrates several features that enhance energy efficiency:

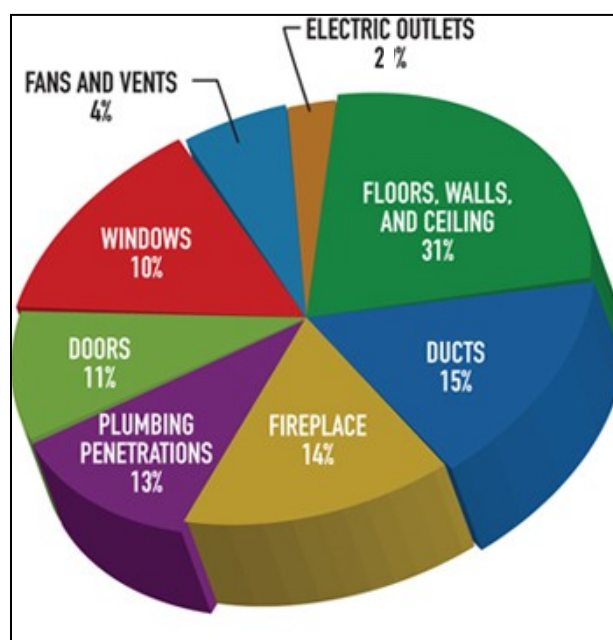
1. Light colored exterior reflects the sun's heat.
2. Operable windows allow for natural ventilation.
3. Steep roof allows for heat to rise up and away from living space.
4. Porch provides shade.
5. Deciduous trees provide summer shade.
6. Light colored concrete on the driveway and walkway reflects the sun's heat.



### Retro-fitting and weatherization

Buildings of the late nineteenth and early twentieth centuries often have inherent energy efficient design features. However, older buildings are often large with numerous windows and minimal insulation, posing particular challenges in the face of rising energy costs. Some building owners have resorted to covering the building's original exterior with synthetic sidings, replacing original windows, and enclosing porches. These actions result in the loss of a property's historic character. However, historic character need not be compromised for improved energy efficiency. Common upgrades to historic buildings include the addition of attic insulation, installation of storm windows, and more efficient heating and cooling systems. In particular, repairing and weather-stripping historic wood windows and adding storm windows often results in energy performance equal to or exceeding new vinyl or aluminum windows and at much less cost.

Every building will benefit from a systematic assessment of its energy-efficiency. Historic buildings can be adapted to benefit from new technology, such as geo-thermal systems, without compromising the specific historic character of the building. Several of the methods for improving energy efficiency of a historic or older building can be performed without the need for review by the Oklahoma City Historic Preservation Commission because those methods will not have any visible effect on the exterior of the building or property. However, requests for replacement or removal of exterior historic architectural components will likely require review.



*This energy loss chart illustrates how much energy is lost through windows versus other types of building components such as ceilings, walls and floors. A building owner may improve energy efficiency more noticeably by increasing insulation, rather than replacing windows. Retaining original windows, improved with weather-stripping, makes economic sense and preserves historic features. (Source: US Department of Energy)*



**Reflectivity**

Another exterior consideration is the reflective heat of non-permeable surfaces, such as driveways, sidewalks, and building roofs. The reflective capability of these surfaces is measured using the Solar Reflectance Index (SRI). SRI values range from 100 for white surfaces to zero for black surfaces. Thus, a higher SRI value equates with a cooler surface, because it has a greater capacity to reflect heat. Emittance, the measure of a surface's ability to release heat, is a second value to consider, ranging from zero to one.

For example, a high-gloss aluminum surface has an emittance value of less than 0.1, while a black non-metallic surface, 0.9. Some materials are better at reflecting and releasing heat than others, with practical application in the built environment. Reflecting heat from the environment surrounding a building increases its interior energy efficiency. There is little difference in emittance values of asphalt versus concrete; however, their SRI values can vary notably.

**Table: Solar Emittance & Solar Reflective Index (SRI) of select material surfaces**

<b>Material surface</b>	<b>Emittance</b>	<b>SRI*</b>
Black acrylic paint	0.9	0
New asphalt	0.9	0
Aged asphalt	0.9	6
“White” asphalt shingle	0.91	21
Aged concrete	0.9	19 to 32
New concrete (ordinary)	0.9	38 to 52
White acrylic paint	0.9	100

Extracted from the table from “Green in Practice 103- Cool Communities,” at website <http://www.concretethinker.com/technicalbrief/Cool-Communities.aspx>

Many property owners are becoming increasingly concerned with energy consumption and costs. When seeking ways to increase energy efficiency, owners of historic buildings must be additionally attentive to the preservation and maintenance of the historic building's materials and character-defining elements such as windows and doors. To get started, an owner of a historic building can hire a professional energy auditor, who will spend a few hours assessing energy use of the building. Some companies may offer an energy audit for free, with an estimate for performing repairs and services.

Owners of historic buildings should aim to achieve energy savings that do not negatively impact building character. Retaining original windows and adding storm windows can often offer the same thermal efficiency as replacement vinyl windows, and be more cost effective. Additionally, building owners should be aware of heat loss through their attics. A certified energy auditor will address attic insulation and ventilation, radiant barrier, HVAC and air duct leakage, and the overall air-tightness of the building. The auditor will likely perform a Blower Door test, which measures the difference between pressure within and outside of a building to detect leakage through unsealed cracks and openings.

**Windows**

The first area addressed for older windows should be air leakage (also known as infiltration), which can be inexpensively fixed with weatherization, such as caulking around window and door frames to seal any leaks and then installing storm windows. Historic windows are often perceived as the first culprits of inefficiency. In many instances, homeowners are too quick to prefer replacement with new windows over weatherization options. In fact, rebuilding historic wood windows and adding storm windows is likely less expensive and makes them as efficient or better than new vinyl windows. A comprehensive window study in Vermont in 1996 found that a weatherized wood window with an added storm window was as energy efficient as most new vinyl thermo-pane windows.

The concept of embodied energy applies to windows and other such building components. The old growth lumber used in historic wood windows can last indefinitely due to a tighter cellular structure achieved by slow growth, unlike new wood or vinyl windows. Furthermore, vinyl windows cannot be recycled and are detrimental to the environment when discarded. Retaining and weatherizing historic windows also eliminates potential waste. Thus, retaining and weatherizing historic windows both increases their energy efficiency and allows a building to retain an important architectural component that helps convey its character and style.

In the 1950s and 1960s, aluminum windows were commonly installed with single glazing on large curtain walls resulting in poor energy efficiency. Metal windows are sometimes replaced due to energy conservation concerns. The energy performance of metal windows can be enhanced by applying weather stripping and security fittings. Spring-metal, vinyl strips, compressible foam tapes and sealant beads are other weather stripping options for such windows. Another option for improving the energy efficiency of metal windows is the installation of storm windows.

Window awnings are an affordable solution to reduce heat build-up within a building during hot outdoor temperatures. Awnings were historically used, so their appearance in historic districts today is appropriate. Window awnings can reduce solar heat gain within a building by 65% on south-facing windows and 77% on west-facing windows.<sup>6</sup>

**Replacement Windows**

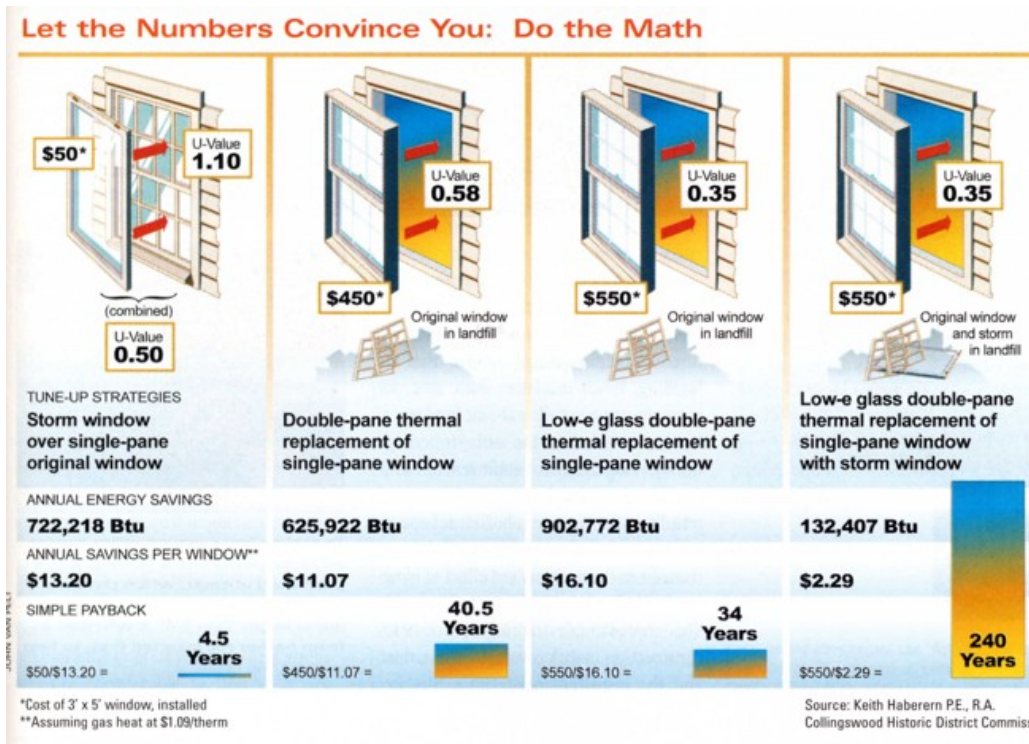
The retention and repair of original wood or metal casement windows is encouraged whenever possible. Wood windows, which are repaired and properly maintained, will have greatly extended service lives while contributing to the historic character of the house. It is not unusual for historic wood windows to remain serviceable for 100 – 150+ years when maintained properly.

Replacement of existing windows due to extreme deterioration must be reviewed carefully. Many times, original yet damaged wood windows are replaced with windows of lesser quality (such as aluminum or vinyl), which have a much shorter life span than the original windows, and in turn, will require replacement in relatively short intervals. In most cases it is less expensive to repair and replace components of the original window fabric than to replace the windows in their entirety. Furthermore, vinyl windows are petroleum-based, meaning they are made from an unrenewable resource. Discarded

6. <http://www.fleetwoodusa.com/Documents/Green-Conscious.php>

All windows expand and contract with temperature changes. However, vinyl expands more than twice as much as wood and seven times more than glass. This often results in failed seals between the frame and glass and a significant performance reduction. Vinyl windows have a high failure rate – more than one-third of all windows being replaced today are less than ten years old. Any energy savings from replacing wood windows with vinyl seldom justifies the costs of installation. For most houses, it would take decades to recover the initial cost of installation and with a life expectancy of 25 years or less, installing new vinyl windows does not make good economic sense. Most vinyl windows do not have the appearance of historic wood windows; the texture and thin frame sizes of the vinyl windows are inappropriate for historic buildings.

A more acceptable alternative to vinyl or vinyl clad windows, if the original windows are beyond repair, are aluminum-clad wood windows with baked enamel finishes. This kind of window offers an insulation factor and protects wood from weathering. Aluminum window manufacturers are addressing sustainability issues with recycled content reportedly reaching up to 70%, of which 40-50% is post-consumer material. At the end of the serviceable life of the replacement aluminum clad windows, 100% of the aluminum cladding can be separated out and melted and used again for new products. Aluminum production from scrap uses up to 95% less energy than new aluminum production. Most of the mined aluminum bauxite, which is used in manufacturing aluminum products, comes from the earth’s non-forested regions ([http://www.fleetwoodusa.net/menu\\_bar/Products/Green-Conscious.php](http://www.fleetwoodusa.net/menu_bar/Products/Green-Conscious.php)). However, aluminum is not a renewable resource. Aluminum framed windows have consistently proven to have inferior insulating properties to wood and, in some cases vinyl windows.



Windows are important character defining features of buildings. In order to retain the highest degree of historic character for historic buildings when window replacement is necessary due to deterioration beyond repair, such windows should be replaced with in-kind windows. If original wood windows are deteriorated beyond repair and require replacement, new wood windows that match the original in design, proportion, shape, location, pattern, size, materials, details and profile is the best choice. Similarly, if original steel casement windows are deteriorated beyond repair and require replacement, the best choice to retain the highest degree of historic character is to use new steel casement windows that match in design, proportion, shape, location, pattern, size, materials, details and profile.

Adding storm windows over historic wood or metal windows is a cost-effective approach that preserves the original window and provides energy savings equal to new replacement windows. The pay-back to the owner is much better as well (Courtesy the *Old House Journal*). Building owners may also want to consider the installation of interior, insulating storm windows. These custom-fit designs have proven effective in dramatically reducing energy consumption and in solar heat gain. They reduce noise infiltration by 67% and air leakage by 75%. Installation requires no disruption to existing windows.

When replacing windows, it is important to understand U-value specifications of available products. The U-value is a measurement of heat transfer through a material, such as window glass. The lower the U-value, the better the insulation. A U-value of .40 or lower is recommended for a North/Central and South/Central climate. Manufacturers are required to affix a label to their windows stating the U-values.



*Appliances are identified through the Energy Star program as meeting governmental standards for energy efficiency. Installing Energy Star appliances can result in significant savings for the homeowner.*

### **Appliances**

Another affordable improvement is to wrap the building's water heater. This appliance is a greedy user of electricity, and energy in the form of heat is always emitting from the tank to the colder air around it. For a cost of \$10-25, a thermal wrap or blanket can reduce the tank's energy consumption by 25-45%, according to the Iowa Energy Center. It is advisable to consult the tank's owner's manual, as some newer models advise against a blanket. If there is any doubt, an easy test is to feel the appliance; if it is warm to the touch, installing a wrap is advised.

A building owner may also want to consider replacement of older appliances. Today's water heaters, as well as washer, dryers, and HVAC units have been designed to use much less energy than their predecessors. Additionally, new heating appliances have entered the market; pellet-burning stoves are

fueled by biomass, residual agricultural products, and are energy efficient revisions of traditional wood-burning stoves. Biomass refers to fuel from plants, versus fossil fuel. The carbon produced in burning biomass pellets is offset by the carbon dioxide absorbed by the original plant. The actual plant material comes from remnants of crops that would otherwise be left behind in the harvesting of the main commodity (corn stalks, for example). Waste from the lumber industry also provides biomass. Thus, the use of pellets made from these left-overs takes full advantage of resources available. Furthermore, these resources are renewable. The down side to biomass is that its manufacture competes with other industries that rely on some of the raw products. Wood pellets, for example are used from the lumber industry's left over sawdust and wood chip, which also are used for particleboard, fiberboard and animal bedding. This competition can cause an increase in prices, another good reason to support the restriction of sprawl, so that land can remain in use for agricultural and timber products.

### **Deconstruction**

Deconstruction is the systematic dismantling of a building in an environmentally, socially and economical manner. The process is a time-consuming and labor-intensive endeavor requiring the separation of materials, resulting in the recycling of building components. Over the last decade, non-profit and for-profit groups have been successful in developing this industry, encouraging the enactment of state and local ordinances, the invention of new tools and equipment and the initiation of tax credits pertaining to deconstruction.

In the U.S., 95% of homes are wood frame. The average 2,000-square-foot wood-frame home has the potential to yield 6,000-board-feet of reusable lumber or about 85 percent of the wood framing. That amount of wood equates to 33 mature pine trees, the annual yield of 10 acres of planted pine. The same house demolished would add about 127 tons or 10,000 cubic feet of debris to a landfill. For every three square feet of deconstruction, enough lumber can be salvaged to build one square foot of new construction.<sup>6</sup>

Aluminum can also be recycled before building demolition. Recovery of aluminum from demolition and replacement in the building industry is minimal compared to recovery from the consumer goods sector. Of the estimated 400 million pounds of aluminum potentially available, only 15 to 20 percent is recovered, according to the National Resources Defense Council.<sup>9</sup>

Brick and wood sash windows can be recycled, as can slate from roofs. These salvaged materials from older buildings can lend an organic quality to new buildings that synthetic siding, vinyl windows and standard asphalt roof shingles cannot. Though the embodied energy of the deconstructed building is lost, that of the building components remains, meaning fewer new resources are required.

### **New Construction**

Encouraging the re-use of existing buildings is a priority, but since new construction is inevitable, design guidelines must also address and promote sustainable practices and materials in new buildings. Recommendations for new buildings begin with assessing the site and designing the building to maximize the natural benefits of the existing environment.

For example, keeping the site's natural contour intact reduces erosion. Preserving existing trees or adding shade trees to shield the southern elevation from summer heat will reduce energy consumption within the building. Additionally, the design of the new building should include porches for shade and should be oriented for optimum ventilation. The use of recycled building materials is highly encouraged, and interior appliances should meet high energy-efficiency standards. Tankless water heaters, geothermal heating and solar panels should all be considered.

Standards in the construction of new buildings have adopted a "green building" approach. In 1988, the United States Green Building Council (USGBC) initiated the program Leadership in Energy and Environmental Design (LEED). LEED is an international certification for construction of green buildings. It is a fully integrated rating system, addressing green design, construction, materials and maintenance solutions. LEED is a popular sustainability standard for the built environment in the United States, with a tiered ranking based on energy efficiency, impact on the environment, clean power generation, water usage, run-off prevention and integration of recycled materials. When considering new construction, a property owner should consult a LEED certified professional and incorporate the same principles of sustainability as recommended for owners of historic buildings.

*This infill house at 516 NW 21st Street is the first Gold certified LEED house constructed in Oklahoma.*



## 1.6 BRIEF HISTORY OF OKLAHOMA CITY

With the Louisiana Purchase in 1803, the United States obtained the land that would become Oklahoma and its capital Oklahoma City. Sixteen years later, the United States Congress created Arkansas Territory that included what would become the states of Arkansas and Oklahoma. The Indian Removal Act of 1830 led to the forced removal of the Five Civilized Tribes, among others, from their lands in points north and east of what became known as Indian Territory (present-day Oklahoma without the panhandle). Much of what would become Oklahoma remained the home of various tribes until after the Civil War.

Oklahoma City was born in the Unassigned Lands at high noon on April 22, 1889. That was the day of the famous Land Run when 10,000 people settled in this new area of the American Frontier hoping to get free land and start a new life. At the time, the area was just a stop on the empty prairie along the Santa Fe Railroad. There were no laws to establish a city, so the people joined together to make the government and laws for themselves.

On that first day, two companies competed to create the new town. Arguments occurred and some were settled by gunfire. The two sides soon agreed to elect a government to help solve their differences. Based on looks alone, a mayor and four councilmen were elected to run the new city. When Oklahoma Territory formed in May 1890, Oklahoma City had 4,151 citizens and the people were finally allowed to have elections again. On August 9, voters elected Mayor W.J. Gault, a clerk, a judge, a treasurer, and eight aldermen to govern the city. Their first official act created the police force. This simple form of government tamed the wild frontier town of Oklahoma City for about twenty years. During that time citizens learned that by working together they could achieve great things.

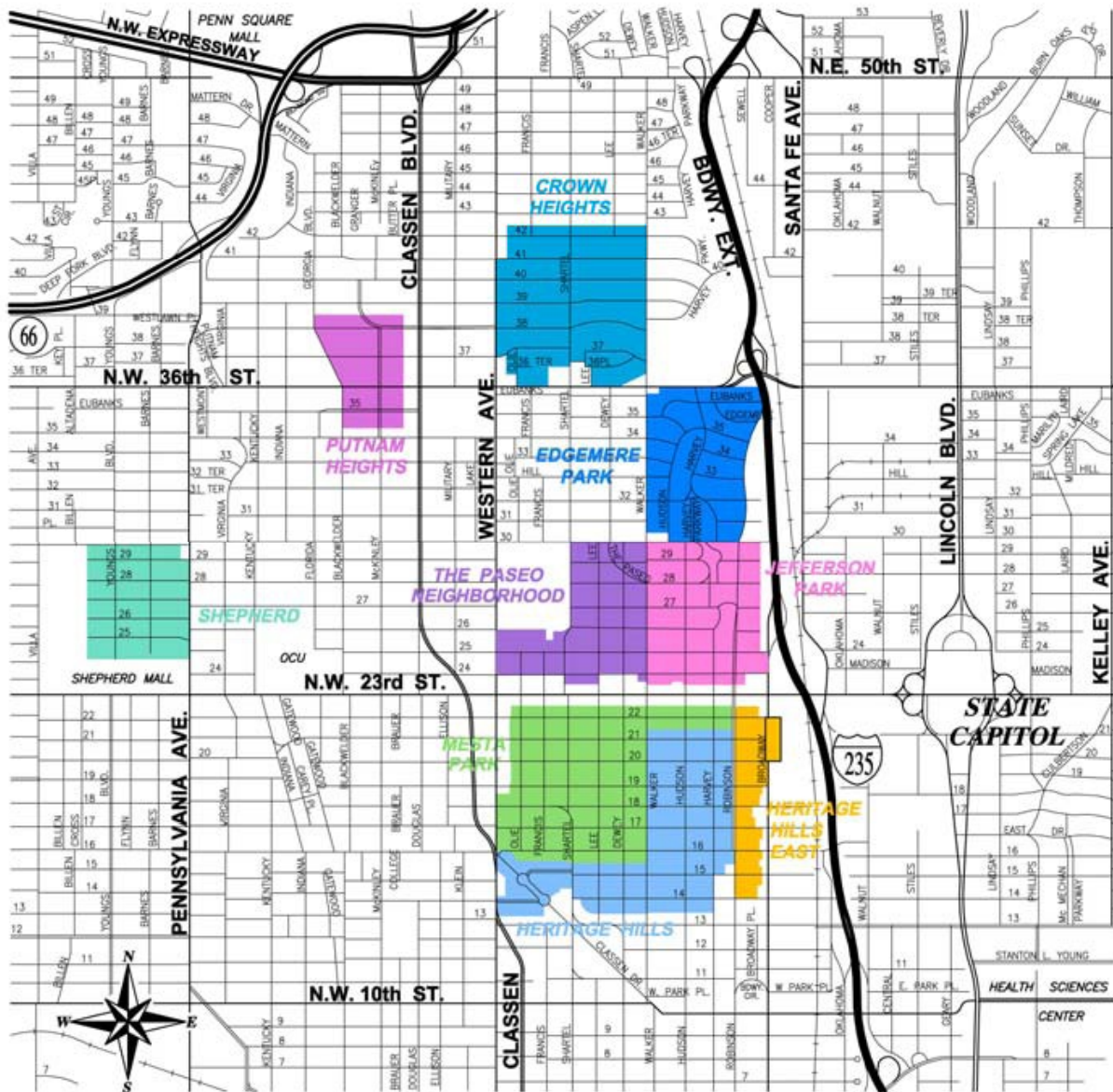
Statehood for Oklahoma came on November 16, 1907 with Guthrie as the state capital. Oklahoma City was then a center of commerce with streets lined with fashionable shops, stores, hotels and restaurants. In 1910, there was a petition to move the state capitol from Guthrie to Oklahoma City; a popular vote was held, and Oklahoma City won. That night, Governor Charles Haskell and a group of conspirators gathered at the Lee-Huckins Hotel in Oklahoma City and undertook a midnight trip to Guthrie to retrieve the State Seal; it was brought back to Oklahoma City, and the governor then declared the hotel the temporary capitol building. The permanent state capitol, located at Lincoln Avenue and 23rd Street, was dedicated in 1917. The dome included in the original design was not built due to excessive costs and a wartime shortage of building materials. The dome was later constructed in 2000-2002.

During its early years, Oklahoma City's wealth derived from cattle, growth of the city as a regional center and its stature as the state capital. While most of the settlers lived on their land, there were several, such as Henry Overholser, who developed commercial and residential property. Original homes were within walking distance of the town center, and with the arrival of the streetcar in the early 1900s, residential neighborhoods began to extend from downtown. Overholser built one of the first and finest homes in Heritage Hills and others followed his example. Victorian, and later bungalow, prairie and revival-style homes were built to house the growing middle-class. The city's population had grown to 64,000 in 1909 and in the following years, there was unprecedented growth in the city with construction reaching new heights. Jefferson Park, University Addition (now Mesta Park), Putnam Heights and Heritage Hills were developed during these years.

Growth continued during World War I, and was soon supported by yet another boom – oil was discovered in the city in 1928. While Oklahoma City was buffered from the recession of 1929 by this new prosperity, it could not completely shield itself from the national depression, feeling its effects in the early 1930's. By then, many of the neighborhoods and districts that would become the city's historic districts had been established and were thriving. After World War II, the city continued its growth outward from the downtown area and beyond the currently zoned Historic Preservation (HP) and Historic Landmark (HL) districts and properties.

Most of the Historic Preservation (HP) and Historic Landmark (HL) zoned districts and properties are listed in the National Register of Historic Places. Oklahoma City has several other residential and commercial districts and individual properties that are listed in the National Register of Historic Places that do not enjoy the benefits of being locally zoned as HP or HL. Listing in the National Register and being locally zoned as HP or HL are two different processes with different implications. While the Historic Preservation Ordinance, a part of the Municipal Code, and these Standards and Guidelines are required to be considered for proposed exterior changes in areas that are locally zoned HP or HL; it is hoped that these Standards and Guidelines will serve as a resource for others that voluntarily seek to retain the historic character of their older or historic property.

## 1.7 OKLAHOMA CITY HISTORIC PRESERVATION AND LANDMARK ZONED DISTRICTS AND PROPERTIES



OKLAHOMA CITY HISTORIC PRESERVATION (HP) AND HISTORIC LANDMARK (HL) ZONED DISTRICTS

In addition to the HP and HL zoned districts, there are also four individual properties that are zoned HL. They are:

- Calvary Baptist Church: 300 North Walnut Avenue;
- St. Paul's Episcopal Cathedral: 127 NW 7th Street;
- Union Soldiers Cemetery: 2000-2192 NE 36th Street; and
- Wells Fargo Building: 115 E Reno Ave



**DISTRICTS** (in alphabetical order)**Crown Heights Historic District**

Listed in the National Register of Historic Places: December 28, 1995

Criteria A and C; NRIS #95001467

Zoned Historic Preservation (HP): 1997

Period of Significance: 1930-1944

The first houses in Crown Heights were constructed in 1931, on land that had previously served as the Oklahoma City Golf & Country Club. Developer G.A. Nichols traded the property for land further to the north, where the present country club and the surrounding Nichols Hills development are located. He developed Crown Heights in the same high quality fashion as earlier developments for which he was responsible. Prominent jurists, corporate executives, downtown merchants and other notable citizens made their home in Crown Heights. Many distinguished dwellings in various historical revival styles, such as Tudor, French Eclectic and Mission, grace the tree lined streets of this gracious historic district. The district is bounded by North Western Avenue, NW 42<sup>nd</sup> Street, North Walker Avenue and NW 36<sup>th</sup> Street, and is anchored on the southeast by a city park.



*Historical markers show the year that each neighborhood was established for the Crown Heights Historic District and the and Edgemere Park Historic District.*

**Edgemere Park Historic District**

Listed in the National Register of Historic Places: November 12, 1980

Criteria A and C; NRIS #80003283

Zoned Historic Preservation (HP): 1977

Period of Significance: 1920s and 1930s, includes a few resources constructed after 1940

In 1926 developer Leon Levy surveyed and platted the Edgemere Park neighborhood. Its unique naturalistic street plan, which follows the contours of the wooded land and the tributary of Deep Fork Creek that meanders through the development, was a departure from the grid plan of other developments of the time. Historical revival style houses, among them many finely detailed Tudor revival cottages as well as larger brick and stone houses of the 1920s through the 1940s, grace the curving streets shaded by many mature trees. Edgemere Park was originally home to mayors, a U.S. Senator, college educators and business executives. The neighborhood, which is bisected by the creek and its surrounding park, stretches from North Walker Avenue to North Robinson Avenue, and from NW 36<sup>th</sup> Street to NW 30<sup>th</sup> Street.

### **Heritage Hills EAST Historic District**

Zoned Historic Preservation (HP) and Historic Landmark (HL): 1999.

Period of Significance: 1903-1930's (same as Heritage Hills)

The Heritage Hills EAST Historic District, created as a combination Historic Landmark and Historic Preservation District, was platted and developed simultaneously with the blocks that would become the Heritage Hills Historic and Architectural District. The blocks east of Robinson Avenue and north of NW 16th Street were platted in the same additions as those to the west, but developed with less prominent houses, as well as duplexes and four-unit properties. South of NW 16th Street were smaller additions with similar buildings. One outstanding mid-rise apartment building, the Aberdeen, was also constructed and commercial development occurred west from Broadway Avenue, which was a highway prior to Interstate construction. In 1999, neighborhood property owners requested Historic Preservation (HP) zoning for the single-family blocks and Historic Landmark (HL) zoning for the mixed residential areas.

*The Heritage Hills Historic and Architectural District and the Heritage Hills East Historic District contain a wide diversity of architectural styles from the early 20th century.*



### **Heritage Hills Historic and Architectural District**

Listed in the National Register of Historic Places: June 4, 1979

Criteria A, B and C; NRIS #79002006

Zoned Historic Preservation (HP): 1969

Period of Significance: 1903-1930's

Heritage Hills was designated as Oklahoma City's first local historic district in 1969, the same year the Historical Landmark and Preservation Ordinance and Commission were established. The district, consisting of all or portions of several historical plats developed from 1900 through the second decade of the twentieth century, has possibly the most architecturally diverse and distinguished residential buildings in the city. The area has been home to many of the business, industrial and financial leaders of the city since its development. The 1928 discovery of oil within the city clinched the neighborhood's reputation as a place where movers and shakers wanted to live. The strong diversity of architecture reflects the district's reputation for being a testing ground for the developing architecture of the city. Initially caught up in the revival styles of the early part of the 1900s – Italian Renaissance, Jacobethan, Georgian and Spanish – builders and homeowners later preferred the “newer” and more modern styles as reflected in the Craftsman and Prairie style houses. Lush landscaping, on both private property and in the parkways and parklands of the district, also characterize this significant Oklahoma City historic district. An “L-shaped” district, Heritage Hills is located south of Northwest 21st Street between North Walker Avenue and North Robinson Avenue, with a section extending westward from North Walker Avenue to North Classen Boulevard along NW 14th Street and NW 15th Street.

### Jefferson Park Historic District

Listed in the National Register of Historic Places: December 14, 1995

Criteria A and C; NRIS #95001466

Zoned Historic Preservation (HP): 1998

Period of Significance: 1905-1939, with specific emphasis on 1909

A 160-acre homestead at the turn of the 20th century, the Jefferson Park Historic District was largely platted and annexed to the city in 1908. A 1909 re-plat created curving streets and parks that reflect the adjacency to the tree lined creek that winds through this historic neighborhood. Residential construction peaked in Jefferson Park during the 1920s, with historic masonry revival style houses and handsome frame Craftsman houses in the same blocks with numerous apartment buildings built in similar revival architectural styles along the streetcar lines. The demand for short term housing during the oil boom of the 1930s resulted in additional apartment construction and some of the city's finest historic multi-family buildings grace the neighborhood. The Jefferson Park Historic District is roughly bounded by NW 23rd Street, North Walker Avenue, NW 30th Street and Interstate 235.



*Attractive signs mark borders of Mesta Park and Jefferson Park Historic Districts.*

### Mesta Park Historic District

Listed in the National Register of Historic Places: July 26, 1983

Criterion C; NRIS #83002102

Zoned Historic Preservation (HP): 1994

Period of Significance: 1906-1930

Mesta Park, developed in stages largely between 1906 and 1930, and was halfway completed by 1915. Some of the more distinguished houses were built on blocks near the streetcar line at North Shartel Avenue and clustered along NW 16th Street. G.A. Nichols, who later created and developed Crown Heights and Nichols Hills, built many houses in the Prairie, Foursquare, Craftsman and other popular styles in the early 20th Century, and also planted many of the trees that now characterize the graceful streets of Mesta Park. Many houses show the influence of the Arts and Crafts movement, emphasizing natural materials and simplicity. Following years of disinvestment, the neighborhood saw revitalization begin in earnest in the late 1970s. Bounded generally by Western Avenue, the north side of Northwest 22nd Street, Walker Avenue and the south side of 16th Street, the Mesta Park District also includes an eastward extension of NW 22nd Street to North Robinson Avenue.

### **The Paseo Neighborhood Historic District**

Listed in the National Register of Historic Places: May 27, 2004

Criteria A and C; NRIS #04000517

Zoned Historic Landmark (HL): 1998

Period of Significance: 1905-1953 with specific emphasis on 1907-1908

The Paseo Neighborhood contains a residential district and a unique historic commercial district along a curved street named “The Paseo.” West of Walker Avenue between NW 23rd and NW 30th Streets, development began in the Paseo soon after statehood, although the majority of the residential construction occurred at about the same time as G.A. Nichols built the Spanish Village shopping center in 1928. In 1991, the Neighborhood Conservation District established special zoning for the area, and provided for HPC oversight and review of the commercial area. In 1998, Historic Landmark zoning extended HPC review to the residential areas. The commercial area was changed from Historic Preservation Commission oversight to design review by the Urban Design Commission in 2009.

The unique Spanish Mediterranean Revival architecture of the village, one of the first upscale shopping areas outside of downtown, was reflected in some of the diverse designs of surrounding dwellings, although many Prairie, Tudor Revival, Craftsman and other styles are represented as well. Numerous apartment buildings constructed in the historic period also demonstrate the diversity of architectural styles and residences that have always been desirable characteristics of this urban neighborhood. Several pieces of the neighborhood have been brought back from rundown status over the decades in Paseo, and the historic district designation initiated another wider, more comprehensive regeneration.



*Signs marking the borders of The Paseo Neighborhood and Putnam Heights historic districts.*



### **Putnam Heights Historic District**

Listed in the National Register of Historic Places: June 2, 1982

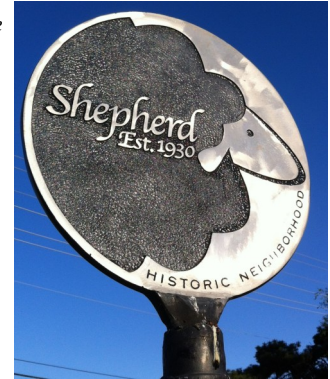
Criteria A, B and C; NRIS#82003693

Zoned Historic Preservation (HP): 1972

Period of Significance: 1908-1930s

A presidential grant of land for the Oklahoma Military Institute at the beginning of the 20<sup>th</sup> Century laid the foundation for development of Putnam Heights located in the area from NW 35<sup>th</sup> Street to NW 38<sup>th</sup> Street, east of Blackwelder and Georgia Avenues and extending eastward to just west of Classen Boulevard. After the Institute’s lone building burned in 1909, Israel Putnam platted the land as a subdivision, and Putnam Heights quickly became home to many of the business and social leaders of the city, as well as governors, state representatives and an attorney general. The eclecticism prevalent in architectural tastes of the period resulted in houses built in revival styles such as Colonial, Georgian, Tudor, Spanish Mediterranean and Mission, and “modern” styles such as Craftsman and Prairie.

*Signs like this one mark the borders of the Shepherd Historic District.*



### **Shepherd Historic District**

Listed in the National Register of Historic Places: June 20, 1997

Criterion C, NRIS #97000612

Zoned Historic Preservation: 1998

Period of Significance: 1931-1941 with specific emphasis on 1931

Part of the homestead granted to George Shepherd in 1896 is now the Shepherd Historic District, an important historic neighborhood developed largely in the 1920s and 1930s near the popular early 20th Century Shepherd's Lake swimming lake and bathhouse. Shepherd is characterized by a variety of brick and stone Tudor Revival and later modified Colonial Revival style houses, with many large trees and a neighborhood park. Tucked between Shepherd Mall (on the site of the 19th century Shepherd farmstead) and Pennsylvania Avenue from NW 25th Street to NW 29th Street, the neighborhood has long had active residents who are providing stewardship and an active revitalization ethic for this important historic district.

## **1.8 ARCHITECTURAL STYLES AND TRADITIONS IN OKLAHOMA CITY**

The architectural style of a house, apartment or commercial building is a convenient way to summarize the form of the structure: its type or use, its scale, shape and interior arrangement, and its details, including materials and ornamentation. Most American dwellings can be categorized by one or more architectural styles. Historic properties in Oklahoma City generally reflect the styles and fashions popular across the United States during the first half of the twentieth century.

A building that was designed in a particular style is not a random collection of individual architectural parts, elements or details. The features of the building are combined to present a coherent image: windows and doors proportional to the dimensions of the house, building materials complementing the scale and shape of the building; porches, roofs and other details reflecting the time period and fashions influencing the builder. Technology, available materials, fashion trends, climate and environment, topography, transportation patterns, family needs and budget all affected the selection of an architectural style when a dwelling was constructed.

Oklahoma City Historic Preservation and Historic Landmark zoned districts were all developed with a local building and annexation boom beginning about 1900. The styles and architectural influences of the buildings in the districts reflect the stylistic fashions prevalent in the western United States during the various periods of their development. By 1900, professional periodicals such as *Western Architect*, Gustav Stickley's *Craftsman* magazine, general publications such as the *Ladies Home Journal*, and regionally, *Holland's Magazine*, were among the many publications that provided homeowners and builders with prolific images of fashionable houses in the latest styles. Specific designs, with detailed building plans could even be purchased from "catalogues," and "kit houses" arrived by railroad car at the owner's local lumber dealer with pre-cut lumber and all necessary materials ready for assembly on site. Local architects and builders offered their clients an abundance of plan and detail offerings. Even popular culture influenced house style choices: some believe that the popularity of historical revival styles during the 1920s stemmed in part from the romantic images of faraway places and picturesque settings portrayed in the movies, which the average American attended twice each week.

The first areas or additions that became Heritage Hills and Mesta Park were annexed to the City of Oklahoma City in 1900 and 1902. Between 1907 and 1908, 22 new additions (including much of Putnam Heights, Jefferson Park and the Paseo Neighborhood) were incorporated into the community, accounting for three thousand new residents living on the northern edges of the established city, beyond 23<sup>rd</sup> Street. The styles of houses and later, apartment buildings, represent the eclectic architectural preferences and fashions of the period, as do the houses in Putnam Heights, Edgemere Park, (platted in 1926 with its picturesque and naturalistic street plan), and Crown Heights (1930). The later, more subdued designs characterizing the Shepherd Historic District reflect the restrained preferences of designers and homeowners during the Depression and World War II.

Most architectural styles occurred in both large and small examples, as design trends were usually adapted to variations in family size and client budget. Individual components may stand out on one building and not on another in the same style, but most importantly, the various elements are carefully combined to mark a particular style. The preservation of these architectural elements contributes to the visual historic integrity of the building. When considered together, the visual integrity of a district and the preserved buildings then help to tell the story of Oklahoma City's development history.

Each of the following architectural styles is prevalent in one or more of Oklahoma City's Historic Preservation and Historic Landmark districts.

### **Queen Anne, 1880-1905**

The emergence of the Queen Anne style coincided with the rise of balloon framing and mass production of wood ornamental features. These developments allowed for extravagant architectural designs with asymmetrical floor plans and irregular roof planes. By 1905, as the neighborhoods north of 10th Street began to be developed in earnest, the popular late nineteenth century **Queen Anne** style had generally fallen out of favor among designers and homeowners. There are few true examples of this style in Oklahoma City.

#### **Characteristics**

- Frame or brick construction
- Corner towers
- Asymmetrical floor plans
- Wrap-around porches
- Highly decorative wood or brick elements
- Painted in rich, contrasting color schemes



*The Overholser House at 405 NW 15th Street is one of Oklahoma City's best examples of the Queen Anne style.*

### Neoclassical, 1895-1950

Around the turn of the twentieth century, there was a renewed interest in Classical architecture. The buildings of the 1893 World's Columbian Exposition held in Chicago represented the influence of the favored classical ideals of order and balance. Such sensibilities were in stark contract to the flamboyance and asymmetry that characterized Victorian styles. In Oklahoma City, the Neo-Classical style became popular beginning after 1900. It is represented by two-story brick and frame dwellings with full-height porticos and classical columns on the primary facades.

#### Characteristics

- Large Ionic or Corinthian columns
- Elaborate entrance, often with a pediment
- Full-height portico
- Rectangular, double-hung sash windows
- Side gabled roof
- Typically a brick exterior



*Neo-Classical style dwelling at 1815 NW Hudson Avenue.*

### Colonial Revival, 1900-1955

The Philadelphia Centennial Exposition of 1876 is credited with first influencing American architects to look towards the country's own architectural roots. The houses in the Colonial Revival style constructed in Oklahoma City before the 1920s were rarely historically correct copies but were interpretations of Colonial period precedents. Most Oklahoma City examples are two-stories, of wood frame construction and with clapboard siding. A few Dutch Colonial houses also appear, differentiated from other Colonial Revival examples by their gambrel roofs with a full story of floor space within the roof.

#### Characteristics

- Symmetry, balance, order
- Classically-inspired elements
- Rectangular plan
- Dormers on a gabled, or hipped, roof
- Flush wall planes



*Colonial Revival style dwelling at 1815 NW 40th Street.*

### Georgian Revival, 1900-1955

After 1920 more academic Georgian Revival houses were constructed. These later, “high style” examples were more often built of masonry and were more carefully researched copies of the style. The rectangular, double hung windows with single panes of glass in both sashes or multiple panes only in the top sash, characteristic of earlier examples, were followed in post 1920 construction with six, eight, nine or twelve panes in both upper and lower sashes.

#### Characteristics

- Symmetrical facade
- Single-bay facade entry porch
- Classical door surround
- Rectangular, double-hung sash windows
- Side gabled roof
- Typically a brick exterior



*Georgian Revival style dwelling at 1525 NW 35th Street.*

### American Foursquare, 1895-1920

A derivative of the Colonial Revival style, this vernacular house form also reflects influences of the Prairie style with its broad roof eaves. This design was used throughout the country in the early twentieth century and is generally two-stories in height. Usually built in square or rectangular designs, decorative porches are common on the main facade. Mesta Park and Heritage Hills display a number of fine examples of this style.

#### Characteristics

- Two-stories in height
- Hipped roofs, often with hipped dormers
- Wide eaves
- Rectangular or square forms
- One-story full-width porches
- Tuscan or other classical porch columns
- Porch columns of brick piers



*American Foursquare design at 208 NW 22nd Street.*



### Spanish Revival, 1900-1940

Concurrent with the rising interest in Colonial Revival style in the East and Midwest around 1900, California architects became inspired by the Mission churches of the southwest. Following the Panama-California Exposition in San Diego in 1915, interest in imitation of Spanish architecture grew quickly, particularly in the southwestern United States. Spanish Revival architecture usually has an exterior of stucco. The popularity of the Spanish Revival style in the region during the 1920s and early 1930s coincided with the peak of streetcar ridership in the neighborhoods north of downtown and ensuing development of apartment buildings both small and medium-sized. The Spanish Revival style and its variations of Mission and Spanish Eclectic, were the preferred designs for many of the two- and three-story multiple family developments in the historic districts.

#### Characteristics

- Stucco exterior
- Terra cotta roof tiles
- Stepped parapet roofline
- Arched window or door openings
- Fixed or casement windows
- Low-pitched or flat roof



*Spanish Revival style dwelling at 529 NW 14th Street.*

### Bungalow/Craftsman, 1905-1930

Based on California architects Greene and Greene's high style versions of Arts and Crafts movement-inspired dwellings, the Craftsman bungalow is ornamented not with applied elements (like Queen Anne spindlework) but by the structural elements themselves, inspired by oriental timber construction. Some distinguished two-story examples of Craftsman design also appear in Oklahoma City historic districts.

#### Characteristics

- One- or one-and-one-half-story
- Low-pitched gabled roof
- Exposed rafter tails
- Brackets under roof eaves
- Tapered porch posts on piers
- Decorative beams and brackets under roof eaves
- Typically wood frame construction
- Multi-light double-hung sash windows



*Craftsman Bungalow at 1529 NW 36th Street.*

### **Tudor Revival, 1910-1940**

The Tudor Revival style is based loosely on Medieval architecture. Peaking in popularity during the 1920s, the style was fashionable for single-family dwellings as well as small apartment buildings. Exteriors can be of stucco with half-timbering, brick veneer or weatherboard siding. Of particular note in several local historic districts is the generous use of fieldstone and clinker brick (irregularly shaped brick that was over-burned in the kiln) interspersed with face brick laid in tapestry, or subtly multi-colored, patterns.

#### **Characteristics**

- Highly pitched roof, often cross gabled
- Entrance is in a project bay with a gable front roof
- Entrance may have an arched door
- Examples may include a tower
- Windows may be multi-light wood sash or case-ments.
- Exterior wall chimney on facade
- Chimneys with decorative chimney pots
- May include faux half-timbering in stucco



*Tudor Revival dwelling at 3404 N. Robinson Avenue.*

### **Minimal Traditional**

By the late 1930s, and after World War II-era embargoes on building materials were lifted, houses based on historical precedents, such as Spanish Eclectic and Tudor Revival, were largely abandoned in favor of more modern and simplified styles. The Minimal Traditional style, which emerged just before the beginning of the war, was loosely based on the Tudor form, with a front facing gable intersecting a larger side gable, but with the steeply pitched Tudor roof lowered significantly and much of the detailing eliminated.

#### **Characteristics**

- Built of brick or wood
- prominent chimney
- asymmetrically placed entry stoop
- Roof of moderate pitch
- Simple double sash windows



*Minimal Traditional dwelling at 1619 NW 38th Street.*

## International and Moderne

During the 1920s and 1930s, *avant garde* European architects were promoting radically new and different designs, including Art Moderne and International. The modernist movement stripped away superfluous décor, emphasizing a streamlined appearance that spoke to the form-to-function concept. This underlying premise and the use of modern materials such as aluminum were perfectly aligned with the technological advances in the oil and gas industry that in many ways defined 1930s and 1940s Oklahoma City. Several excellent examples of these styles remain in the city's historic districts.

### Characteristics

- Asymmetrical plan and composition
- Simple geometric forms
- Flat roof
- Smooth exterior surfaces
- Rounded corners
- Glass block windows and wrap-around windows
- Aluminum and steel trim



*Art Moderne house at 3200 N. Harvey Parkway.*



*International style house at 2240 NW 27th Street.*

## 1.9 OVERALL APPROACH AND FORMAT

The primary approach of the Historic Preservation Commission (HPC) and these design review standards and guidelines is the emphasis on preservation instead of removal/replacement and the use of sustainable practices and materials where possible. This approach is illustrated by the use of words and phrases such as *repair*, *retain*, *maintain* and *replace in kind*. In conducting its review the Commission will review Certificates of Appropriateness applications with the following approach:

- ⇒ Property owners and applicants should first consider retaining, maintaining, preserving and repairing original or historic building features.
- ⇒ If such features and elements cannot be retained, maintained, preserved or repaired, then replacement in kind is recommended. Replacement in kind means that the new feature and element matches the existing, original or historic in material, size, detail, profile, texture and finish as closely as possible. Architectural details and materials can be documented using drawn, photographic or physical evidence. Such documentation will help define appropriate rehabilitation activities.
- ⇒ If material replacement in kind is not feasible or practical, the HPC may consider the use of appropriate substitute materials that are sustainable.
- ⇒ Rehabilitation of historic buildings is reviewed to determine the impact, compatibility and appropriateness of proposed work toward maintaining the authenticity of the existing structures, site, streetscape and district especially when viewed from the public right-of-way.
- ⇒ Rehabilitation should “work with” the historic building or structure for which it is proposed. Compatible rehabilitation efforts are those that protect and retain authentic and significant architectural features and elements of individual buildings and the district.



*Design guidelines stress the need to preserve original materials that illustrate style and character such as the stone and brick exterior and original windows on the dwelling at 805 NW 40th Street.*

Throughout the standards and guidelines a number of terms are frequently used to reflect the design principles that the HPC will consider when making decisions. These terms and their interpretation are as follows:

**Appropriate:** Rehabilitation and new construction actions especially suitable or compatible with the design standards and guidelines.

**Compatible/Compatibility:** The characteristics of different uses or activities that permit them to be located near each other in visual harmony and without conflict.

**Character:** Attributes, qualities and features that make up and distinguish a particular place or development and give such a place a sense of definition, purpose and uniqueness.

**In Kind:** Use of the same or similar materials to the original or existing materials.

**Preservation:** The adaptive use, conservation, protection, reconstruction, restoration, rehabilitation or stabilization of sites, buildings, districts, structures or monuments significant to the heritage of the people of Oklahoma City.

**Recommended:** Suggested, but not mandatory actions outlined in the design guidelines.

**Rehabilitation:** The act or process of making possible a compatible use for a property through repair, alterations and additions, while preserving those portions or features which convey its historic, cultural or architectural values.

**Scale:** The harmonious proportion of parts of a building, structure or monument to one another and to the human figure.

**Significant (Characteristics of Historical or Architectural Resources):** Those characteristics that are important to, or expressive of, the historical, architectural or cultural quality and integrity of the resource and its setting; and includes, but is not limited to, building material, detail, height, mass, proportion, rhythm, scale, setback, setting, shape, street accessories and workmanship.

The design standards and guidelines also consider the potential importance of past remodeling work or additions that may have gained historic significance. Many properties built in the nineteenth century were later remodeled in the early twentieth century and these remodels may be significant in reflecting the evolution of the building over time. For example, Bungalow porches were often added to Folk Victorian and Queen Anne style homes in the 1910s and 1920s. Property owners should consider preserving and maintaining these types of features to illustrate the influence of later historical styles.

When the existing form, materials and ornament of a historic building cause it to retain its essential historic character, **preservation and maintenance** of those features is preferred. When a building has been subjected to numerous alterations over time, it is important to determine the relative integrity and importance of existing materials and forms. If the alterations are an important part of the building's history or significance, then their preservation may be appropriate, particularly if they are more than 50 years old.

Historic photographs, Sanborn fire insurance maps, written accounts and other sources may provide information about the earlier appearance of buildings. Sources for historic photographs include the local Metropolitan Library System and the Oklahoma Historical Society (the State Historic Preservation Office and the Research Division). Other sources may include previous owners, neighbors, neighborhood associations and newspaper archives.

Some exterior alterations and additions to historic buildings are often needed to assure their continued use, particularly when adapting a historic multifamily residence to single-family use or adapting a historic residential building for commercial use. When such alterations or additions are made, the project is described as **rehabilitation**. While rehabilitation projects are frequently appropriate, it is important that alterations and additions are compatible and do not radically change, obscure or destroy the features of the building that define its historic character.

Repair of historic buildings or their components is often necessary and desired to assure a building's continued use and to correct deterioration of components of the building such as siding, trim, roof, or window parts.



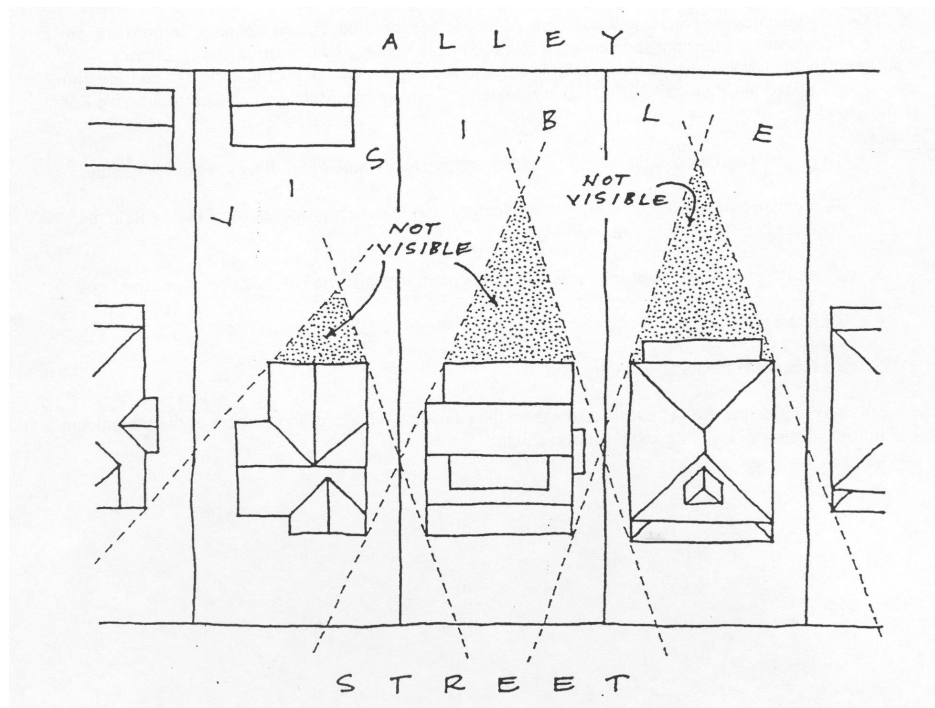
*The reconstruction and restoration of the parapet and attic dormer windows at 311 NW 19th Street was achieved with the help of a historic photograph (above: historic; upper right: before restoration; lower right: after restoration)*



### **1.10 DESIGN REVIEW: PUBLIC AND PRIVATE SPACE IN HISTORIC DISTRICTS**

Design review for Oklahoma City's historic districts and landmarks is concerned primarily with the primary facade or "public face" of buildings as opposed to back or side elevations that are not readily visible from the public streets or rights-of-way. Public and private spaces are usually both visually and physically connected. City streets and sidewalks connect with individual driveways and walkways forming a physical and visual network of public and private spaces. In using city streets and sidewalks, the public has a range of view into spaces that property owners may consider private spaces. This view integrates visual qualities along a given streetscape, such as setback, scale and massing of buildings. Ideally, in a historic district, these qualities create a visual continuity. This premise forms the basis for design guidelines, assisting property owners in maintaining individual and collective historic character within a cohesive district and for a historic property.

Public view does not stop at the vertical plane of a building face. Rather, there is depth to public view, and a person moving along a city street or sidewalk can see portions of side elevations of buildings, as well as into back yards. Landscaping and privacy fences can help minimize the “access” of public view into back yards. However, historic property owners should keep in mind the visibility of some portion of side and back yards from the street and public sidewalks. The most private space on private property is an area directly behind a building. These areas are ideal for site additions such as decks, patios, outdoor furniture, pools, fountains, terraces, sculptures, planters, trellises and pergolas.



*Design review is more flexible for back elevations not readily visible from public streets or sidewalks and out of public view.*

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## ***Preservation Standards and Guidelines:***

### **Chapter 2**

## **SITE AND LANDSCAPE CONSIDERATIONS**

### **2.1 LOT SIZE**

#### **POLICY:**

*Each historic property consists of the site, or “lot,” and the buildings or structures placed within the site. The relationship of buildings and structures to their respective site, to adjacent sites and to the public rights-of-way are important character-defining features of historic properties and districts and should be an integral part of planning for every project.*

#### **DESIGN JUSTIFICATION:**

*The historic relationships between buildings, structures, sidewalks, streets, landscaping features and open space together create the character of a district and should be retained.*

#### **SUSTAINABILITY JUSTIFICATION:**

*Maintaining historic spatial arrangement ensures the preservation of component parts, sustaining their embodied energy and negating the need for replacement with new resources.*

#### **MAINTENANCE:**

##### **ACTIONS THAT DO NOT REQUIRE REVIEW**

- 2.1.1: Historic districts generally have a uniform, and unifying, orientation of properties to their respective development and the development of adjacent properties. Typical lot sizes help define the district’s commonality and integrity.
- 2.1.2: Retain the historic lot size and configuration of the property.

#### **COMMISSION REVIEW:**

##### **ACTIONS THAT REQUIRE REVIEW BY THE HPC**

- 2.1.3: If new lots are created, they should have a width no less than 90 percent and no more than 110 percent of the average width of all lots in both the same blockface and the opposite blockface.
- 2.1.4: Development or redevelopment of vacant lots must respect the historical development of the property and district in terms of lot size and relationship between public and private spaces.

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## 2.2 SETBACKS

### POLICY:

*Maintaining historical patterns of development including front and corner side-yard setbacks is an important character-defining feature of a district.*

### DESIGN JUSTIFICATION:

*Historic setback patterns are important for maintaining an authentic streetscape and protecting vistas from, and views to, a historic property and district.*

### SUSTAINABILITY JUSTIFICATION:

*Maintaining historic front and side-yard setbacks ensures the preservation of a district's components, sustaining their embodied energy and negating the need for replacement with new resources.*

### MAINTENANCE:

#### ACTIONS THAT DO NOT REQUIRE REVIEW

- 2.2.1: Along a streetscape in a historic district, there is often a uniform and unifying setback for buildings from the street. Maintain consistency with historical setbacks to preserve historic development and historic subdivision patterns.
- 2.2.2: Maintain building orientation patterns, for example, with front facades of primary buildings facing and parallel with the street.
- 2.2.3: Maintain established side-yard setbacks and spacing patterns between buildings to reinforce the sequence of individual structures along the streetscape.
- 2.2.4: Maintain established setbacks for accessory buildings.



*The 2200 block of NW 26th Street (left) and the 2100 block of NW 28th Street (right) illustrate consistent setback of houses from the street.*



*The original garages at 610 NW 17th Street (left) and 2601 N. Hudson Street (right) observe the traditional setback for secondary buildings, which is to the back of the primary building.*

### **COMMISSION REVIEW:**

#### **ACTIONS THAT REQUIRE REVIEW BY THE HPC**

- 2.2.5: Development of vacant lots must respect the historic development of the property and the district in terms of setbacks and relationship between public and private spaces.
- 2.2.6: Accessory buildings should follow the historic setback patterns of the property or other accessory buildings in the streetscape or district when replaced in kind.
- 2.2.7: New construction must be reviewed not only for architectural design, but also for historic back and side-yard setbacks.



*On corner lots, the traditional side yard setback should be maintained, (2240 NW 27th & 2140 NW 26th Street).*

## 2.3 SIDEWALKS, DRIVEWAYS, PARKING LOTS, CURBS AND VACANT SITES

### POLICY:

*Sidewalks, driveways and off-street parking should not interrupt the historic continuity of landscaped front or corner side yards. Historic concrete sidewalks and walkways should be preserved and repaired with concrete that is consistent in pattern, size, texture and color. Historic concrete driveways should be preserved and new driveways should be of concrete rather than asphalt.*

### DESIGN JUSTIFICATION:

*Historically, the consistency and repetition of sidewalk and driveway spacing, placement, dimension and materials create a rhythm to the street. Retaining the specific rhythm of a street is important to preserve historic character. Oklahoma City's historic districts and properties have strong visual elements of grey colored concrete for sidewalks, walkways, some streets and curbs.*

### SUSTAINABILITY JUSTIFICATION:

*Existing historic concrete sidewalks, steps and driveways represent embodied energy and should be preserved. Concrete is a long-lasting sustainable material, reflects solar heat and light and should be repaired or replaced as needed with new concrete to match. New driveways should be of similar design, pattern, texture, dimensions and color as the historic driveway. The use of permeable paving for non-historic and new driveways, sidewalks and parking areas is encouraged because it helps to reduce water run-off.*

### MAINTENANCE:

#### ACTIONS THAT DO NOT REQUIRE REVIEW

- 2.3.1: Regular maintenance of site features such as walkways, sidewalks and driveways is encouraged and should employ non-abrasive methods such as sweeping and low-pressure water cleaning.
- 2.3.2: Vacant sites must be maintained clear of debris.



*Many walkways, sidewalks and streets in historic districts are of original grey concrete and are important visual elements to preserve and maintain. (717 NW 40th Street, left; and 2229 NW 26th Street, right).*





*Many walkways and driveways conform to the landscaped rolling terraces laid out by the original developers (left: 2300 block of NW 35th Street). Concrete curbing and street surfaces have a higher reflective value than asphalt (800 block of NW 42nd Street).*

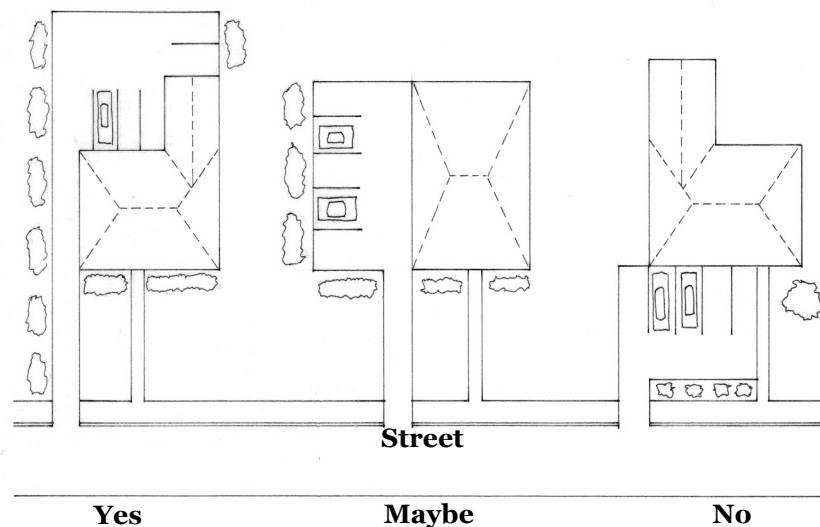
- 2.3.3: Routine maintenance ensures the preservation of such site elements, sustaining their embodied energy and negating the need for replacement.
- 2.3.4: Retain and preserve historic sidewalks and driveways, including those that are shared by two adjacent properties.

#### **ADMINISTRATIVE REVIEW:**

##### ACTIONS THAT REQUIRE REVIEW AND MAY BE ADMINISTRATIVELY APPROVED

- 2.3.5: Maintain the continuity of existing original or historic sidewalks and the curb cut radius or curved approach when replacing an existing driveway or introducing a new driveway.
- 2.3.6 New concrete for sidewalks, driveways, curbs, and parking lots shall match the aged appearance in design details, color and texture of the existing concrete it replaces or adjacent concrete that will remain. If new concrete is not replacing existing concrete and is not adjacent to any existing concrete it should have an aged appearance in color and finish. New concrete visible from the public right-of-way shall not be bright white in color.
- 2.3.7: All sidewalks, driveways, and curbs visible from the public right-of-way shall be constructed to maintain the continuity of materials and character present in the district.
- 2.3.8: Private sidewalks and driveways must be constructed of concrete except where historical precedent demonstrates the previous existence of brick, stone or other materials, which may be considered appropriate for replacement.
- 2.3.9: Maintain the continuity of existing original or historic sidewalks and the curb cut radius or curved approach when replacing an existing driveway or introducing a new driveway.
- 2.3.10: Locate new driveways and sidewalks so that the topography of the building site and significant landscape features, such as mature trees, are retained. Protect mature trees and other significant landscape features from direct construction damage and from delayed damage such as destruction of root area or soil compaction by not permitting construction equipment access to the ground area under the tree canopy.
- 2.3.11: Curb cuts, including those intended to comply with the Americans with Disabilities Act (ADA), should be installed to minimize damage to the original concrete sidewalks. The color and texture of the new concrete shall match and be consistent with the existing adjacent concrete color and texture.

- 2.3.12: Driveways, eight feet or less in width, may be replaced by a driveway of up to ten feet in width; width may vary as the driveway approaches the garage to correspond to the width of the garage door openings. However, property owners are encouraged to limit the quantity of impervious concrete surfaces to assist in reducing storm water runoff.
- 2.3.13: Ribbon driveways consisting of two parallel tracks, may also be considered. This type of driveway reduces storm water run-off across hard or impervious surfaces by minimizing the amount of concrete used.
- 2.3.14: Circular drives that connect to the street by two or more curb cut openings, are not allowed in front or corner side yards unless demonstrated as historically present on the specific property.
- 2.3.15: New off-street parking for multi-family properties must be located so as to minimize the number and width of curb cuts on primary residential streets. Owners of adjacent apartment or commercial properties should consider shared driveways and shared parking agreements when appropriate to reduce the overall lot coverage of off-street parking.
- 2.3.16: New impermeable parking surfaces must be graded to drain toward the street and away from buildings.
- 2.3.17: Although the Municipal Code has specific requirements for surfaces to be used for driving and parking, consideration should be given to the use of permeable paving surfaces, such as unit pavers or recycled-plastic grid systems installed below grade, to reduce run-off and flooding. Crushed rock or pea gravel is not permitted by the Municipal Code as an individual parking surface. Parking directly on the ground (earth, dirt, or grass) is also not permitted. Various types of permeable paving may be appropriate in the back yard as long as the paving is not visible from the public right-of-way and the Municipal Code requirements are met.
- 2.3.18: Removal of non-historic existing parking lots adjacent to streets and driveways is encouraged to create an unbroken blockface.



*Parking lots are not permitted in front yards, should not be sited in side yards, and may be permitted in back yards.*

- 2.3.19: Existing parking areas for commercial properties should be screened from adjacent streets and sidewalks to a minimum height of three feet. Landscape screens are preferred over fences and fence walls.
- 2.3.20: Screen parking from streets and pedestrian areas by placing parking areas at the back of a property and behind primary structures. New parking areas for corner lots shall be located behind primary structures, set back as far as possible from side streets, and placed so as to be as inconspicuous as possible.



*Permeable parking surfaces allow greater water absorption, less runoff, and should be considered for new parking areas that are not visible from the public right-of-way instead of solid concrete (right). Alternate permeable paving materials for patios, sidewalks or other similar uses are encouraged in back yards that are not visible from the public right-of-way*

- 2.3.21: In addition to being located at the back of the lot, new parking areas for commercial properties must be screened from adjacent residential property by sight-proof screening with fences, walls or dense vegetation at least six feet tall. Landscape screens are preferred, because they absorb carbon dioxide.



*New concrete sidewalks and curb cuts should be designed to match the traditional concrete color and texture in the districts. The color and texture of these mismatched concrete sections demonstrate how mismatched concrete can detract from the character of the historic district and are inappropriate (1500 block of NW 37th Street and at McKinley and NW 37th Street).*



**COMMISSION REVIEW:****ACTIONS THAT REQUIRE REVIEW BY THE HPC**

- 2.3.22: Driveways of asphalt, brick, or textured and patterned concrete to resemble brick are not consistent with the historic materials of the districts and are not permitted unless historic documentation is provided to demonstrate the historical appropriateness of such materials.



*Repair of original concrete surfaces should be with new concrete to match the existing in color, texture and design (837 NW 42nd Street ).*

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## 2.4 SERVICE AND MECHANICAL AREAS

### POLICY:

*Mechanical equipment, such as HVAC units and satellite dishes, should be located out of public view. They should be screened with landscaping (best) or fencing (acceptable).*

### DESIGN JUSTIFICATION:

*Most mechanical units and equipment are non-historic additions to buildings, and the effect of their visual impact on a property's or district's historic character should be minimized.*

### SUSTAINABILITY JUSTIFICATION:

*Maintaining equipment ensures its continued use, which conserves materials required for replacement. Screening with landscaping is preferred over fencing and the plants absorb carbon dioxide. New fencing materials require new resources and energy to manufacture, transport and install.*

### MAINTENANCE:

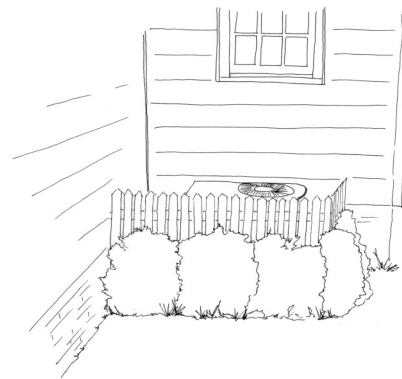
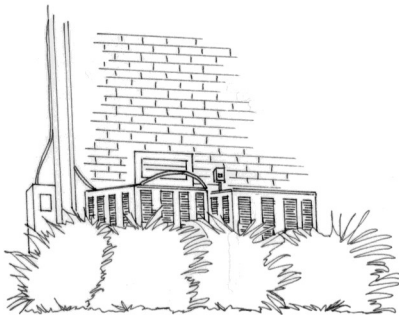
#### ACTIONS THAT DO NOT REQUIRE REVIEW

- 2.4.1: Maintain mechanical equipment to operate efficiently and for continued use, which conserves energy and resources required to manufacture replacements.
- 2.4.2: Electrical, water, gas, security, telephone and cable equipment sometimes need to be upgraded. Replacement utility boxes and meters of various types, located in the back yard or mounted on the back wall of the primary building and less than six feet above the ground do not require review unless they will be visible from the public right-of-way.

### ADMINISTRATIVE REVIEW:

#### ACTIONS THAT REQUIRE REVIEW AND MAY BE ADMINISTRATIVELY APPROVED

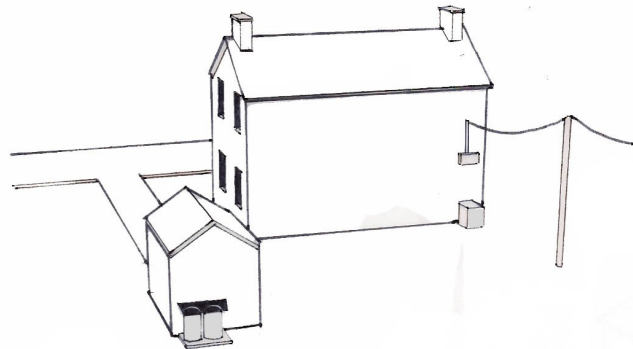
- 2.4.3: Service and mechanical equipment are commonplace, but their presence must be minimized by appropriate placement and screening. A planted screen is preferred and a fence screen is also acceptable.



*HVAC units should be screened through landscaping (left) or through a combination of fencing and landscaping (right).*

- 2.4.4: Service equipment (including ground mounted solar collectors), mechanical areas and trash receptacles, if proposed, must be screened from the street and other pedestrian areas. Loading areas should be located away from primary facades and be well maintained.
- 2.4.5: New window air-conditioning units may be used and must not be located on the front or corner side facade of a structure. Existing window units located on the front or corner side facade may be replaced in kind in the same location, although it is preferred that a less obtrusive location be selected.
- 2.4.6: New “through-the-wall” air conditioners, heaters, or combination units may be used in additions and new construction on back elevations or side wall locations that are screened and hidden from view by fences that meet the requirements and recommendations of the section of the Standards and Guidelines regarding Fences and Fence Walls.
- 2.4.7: Roof-mounted equipment is not allowed on front- or corner side yard-facing roof planes and must be set back from the edges of roofs and screened, so that it is not visible to pedestrians in the public right-of-way and does not detract from the historic character of buildings and the district.

*See also the section called “Features for Improving Energy Efficiency,” in Chapter 4 for the placement of solar collectors.*



*Mechanical systems and HVAC units should be sited at back elevations.*



*An example of appropriate screening of HVAC units is the landscaping which conceals the air conditioning units at 1442 NW 37th Street.*

## 2.5 LANDSCAPE & LANDSCAPE ELEMENTS

### POLICY:

*The term “landscape” comprises the exterior environment of a historic property. Landscape elements can be natural or constructed features, including decks, patios, landforms, site furniture, pools, fountains, terraces, sculptures, planters, trellises, pergolas, outdoor lighting and other features, which generally should be located out of public view. Landscape features should be restrained on the fronts of buildings to allow viewing of the “public face” of the property and maintain historic streetscapes.*

### DESIGN JUSTIFICATION:

*Just as the site, context and environment are critical to the character of a historic building, property and district, the landscape is also an important character-defining feature of a historic property. Original or historic landscape elements may be important character-defining features of a historic property and should be preserved. Added landscape features are more appropriate in back or side yards.*

### SUSTAINABILITY JUSTIFICATION:

*Retain existing elements that represent embodied energy or impart some degree of energy efficiency to the building (e.g., a shading pergola). Address sustainability standards when installing new elements, such as light fixtures with solar cells. Screening with landscaping is preferred over fencing, as fencing requires new resources and energy to manufacture and transport. Landscaping with native and low-*

### MAINTENANCE:

#### ACTIONS THAT DO NOT REQUIRE REVIEW

- 2.5.1: Maintain existing historic landscape and landscape features to preserve the historic district setting.
- 2.5.2: Historic elements, such as retaining walls, should be retained and preserved.
- 2.5.3: Landscape elements in back yards, not visible from any street or adjacent property and less than six feet in height are not subject to review unless a building or other type of permit is required by the Municipal Code.



*Original retaining walls (left: 2240 NW 26th Street and right: 601 NW 14th Street) should be preserved and maintained.*

- 2.5.4: Retain and preserve historic porch lights. They may be refurbished for modern electrical wiring and equipment in order to use modern lamps or light bulbs.
- 2.5.5: Pool slides, play equipment and tree houses in back yards are not subject to review unless a building or other permit is required by the Municipal Code.
- 2.5.6: Preserve existing historic pergolas or trellises as they are character-defining features of a historic building and property (see also 3.4, Pergola or Freestanding Trellis).
- 2.5.7: Preserve and maintain original light fixtures in front yards.
- 2.5.8: Maintain existing, successful drainage patterns to minimize run-off, which can contain herbicides and pesticides, introducing them into the waste water system.
- 2.5.9: Unobtrusive foot-lighting may be installed along pathways. Solar-powered fixtures are encouraged.
- 2.5.10: Patios and other paved landscape elements in back yards should use permeable paving systems to minimize changes to drainage patterns and storm water run-off.



*Solar-powered footlights as at 205 NW 31st Street (left) and 217 NW 31st Street (right) are encouraged for walkways if new lighting is desired.*



*Pergolas at back elevations can help provide shade and are compatible with many architectural styles in Oklahoma City.*

#### **ADMINISTRATIVE REVIEW:**

##### **ACTIONS THAT REQUIRE REVIEW AND MAY BE ADMINISTRATIVELY APPROVED**

- 2.5.11: Actions beyond maintenance have the potential to alter a site or building, which could affect their historic character.
- 2.5.12: The introduction of new materials visible from the public right-of-way will likely be sustainability considerations and require administrative review.
- 2.5.13 Landscape elements that are not visible from any public way and otherwise meet all relevant guidelines may be administratively approved.

- 2.5.14: New retaining walls may be approved to preserve a natural or existing historic slope in the front and side yards only if an earlier retaining wall on the property can be documented.
- 2.5.15: New retaining walls not to exceed two feet in height may be approved to preserve a natural or existing slope in back yards not visible from the public right of way.
- 2.5.16: The height of a new retaining wall may not exceed the height of the slope it retains.
- 2.5.17: A retaining wall in front or side yards visible from the public right of way shall be constructed of unpainted natural stone, brick or finished concrete that is compatible in texture, color and style to the main building or adjacent paving materials.
- 2.5.18: A retaining wall constructed in side or back yards not visible from the public right of way may be constructed of alternative materials; i.e., concrete block, landscape block, landscape timbers, etc.
- 2.5.19: Adding a pergola (see also 3.4, Pergola or Freestanding Trellis) to a back elevation can help shade an outdoor space and can offer some degree of shade to the interior, which means added energy efficiency. Do not add a pergola or trellis to a prominent elevation where none historically existed. Reconstruction of a missing pergola or trellis should be based on accurate evidence of the original design.
- 2.5.20: New pergolas, not visible from the public right of way, may be constructed in back yards, at rear elevations or at accessory structures.
- 2.5.21: New pergolas shall be compatible with the building to which they relate in proportion, size, scale and material.
- 2.5.22: New pergolas constructed as an attachment to a primary or accessory structure shall be reviewed as a building addition and shall not damage or obscure historic character defining features.
- 2.5.23: New pergolas shall not be constructed in such a manner that abutment or attachment to an existing structure will allow for the pooling of moisture against or the infiltration of moisture into an existing structure.



*When this lot is developed with new construction, the existing rolling terrace (also known as a “bench”) topography should be retained and not reduced to the street grade (100 block of NW 31st Street).*

- 2.5.24: The bottom of the canopy of a new pergola shall not exceed eight (8) feet above the finished floor height of the structure to which it relates, and the overall height of a pergola should not exceed nine (9) feet and shall be compatible with the building to which it relates in proportion, size, scale and material.
- 2.5.25: Freestanding pergolas may have concrete floors; however, permeable flooring materials are recommended. Posts may be set in concrete.
- 2.5.26: Pergolas shall be constructed of wood or sustainable alternative materials that closely resemble wood and may have decorative functional metal elements such as wrought iron where appropriate. Synthetic materials that do not closely replicate historic fabric, such as plastic and vinyl, are prohibited.
- 2.5.27: Pergolas with columns or walls constructed of permanent building materials such as brick, stucco, or stone shall be reviewed as new construction.
- 2.5.28: New rear decks shall be compatible with the building to which they relate in proportion, size, scale and material.
- 2.5.29: New rear decks that exceed six (6) feet in height or are visible from the public right of way require a certificate of appropriateness.
- 2.5.30: New rear decks shall be constructed of wood or sustainable alternative materials that closely resemble wood and may have decorative or functional metal elements such as wrought iron where appropriate. Synthetic materials that do not closely replicate historic fabric, such as plastic and vinyl are prohibited.
- 2.5.31: Rear decks that permanently attach to the structure, have a roof, or are constructed of permanent building materials such as brick, stucco or stone shall be reviewed as building additions. CMU is prohibited unless matching documented original or historic building material on site.
- 2.5.32: New decks shall not be constructed in such a manner that abutment or attachment to an existing structure will allow for the pooling of moisture against or the infiltration of moisture into an existing structure.
- 2.5.33: Swimming pools, hot tubs, and similar structures shall be located in back yards and shall not encroach into side setbacks or utility easements.
- 2.5.34: Swimming pools are structures and contribute to the overall built space of the lot, affecting drainage conditions of the lot and adjacent properties; therefore, impermeable pool decks shall be constructed to direct water away from surrounding structures and toward storm drains, French drains, or water harvesting containers.
- 2.5.35: Significant alteration of the topography of a property through extensive grading, removal or alteration of rolled terraces and similar character-defining features, filling or excavating, is not permitted.
- 2.5.36: Relocating drainage features is discouraged, unless such actions seek to correct poor surface and storm water run-off drainage situations. Storm water harvesting is encouraged.
- 2.5.37: It is not appropriate to alter the overall character of historic districts by substantially reducing the ratio of open space to built space on any site through new construction, additions or introduction of surface paving or other hardscape features.



- 2.5.38: Landscape elements such as stone or masonry edging materials for raised planting beds shall not exceed 18 inches in height in front or side yards and shall match or complement the design, scale and details of such elements historically found within the historic district.
- 2.5.39: Illumination of facades with site lighting to highlight ornamental detail may be permitted. Fixtures must be small, shielded and directed toward the building rather than toward the street, so as to minimize glare for neighbors or pedestrians. Incandescent white light is encouraged. Exposed conduit and overhead wiring are not permitted.
- 2.5.40: Use and installation of non-original pole-mounted gas lights in front yards is discouraged; foot lights along walkways are preferred.

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## 2.6 VIEWS AND VISTAS

### POLICY:

*Maintaining views and vistas helps preserve a historic setting as a whole. Maintenance of trees and shrubs with seasonal trimming allows for moisture evaporation around a building and permits visibility of the district's historic setting from the street.*

### DESIGN JUSTIFICATION:

*Many of the city's historic districts were designed with uniform setbacks creating continual views or vistas along the street. These historic patterns should be maintained and not interrupted with added features.*

### SUSTAINABILITY JUSTIFICATION:

*Maintaining the setting and views in the city's historic districts is part of overall livability and retention of character.*

### **MAINTENANCE:**

#### ACTIONS THAT DO NOT REQUIRE REVIEW

- 2.6.1: Preserve existing streetscape views and vistas. Do not obscure views with hardscape elements such as structures and prominent landscape features.
- 2.6.2: Indigenous plant species, which are better adapted to local climate, may require less water than non-native species and are therefore encouraged. Deciduous trees which provide shade in the summer and allow passive heating in the winter are also encouraged.
- 2.6.3: Maintain an un-obscured view of the primary building by keeping trees and plants trimmed and limbed up.

### **ADMINISTRATIVE REVIEW:**

#### ACTIONS THAT REQUIRE REVIEW AND MAY BE ADMINISTRATIVELY APPROVED

- 2.6.4: Actions beyond maintenance have the potential to alter a site or building and may affect the visual historic character.
- 2.6.5: Landscape elements or hardscaping elements such as raised planting beds must not obscure the views and vistas from or to the primary historic structure of the property within a historic district.
- 2.6.6: Avoid rearranging the site by moving or removing buildings and historic site features such as sidewalks, driveways and fences that help define views and vistas and create "public" and "private" spaces.

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## 2.7 PLANTS AND PLANTING RECOMMENDATIONS

### POLICY:

*Landscaping with trees and plants generally does not require Certificate of Appropriateness review. However, it is recommended that mature planting patterns and designs be respected for their historic character, and that new trees and plants be placed so as not to obscure or damage, presently or in future, significant character-defining features of the property, primary structure or overall site.*

### DESIGN JUSTIFICATION:

*Landscaping in the city's historic districts may include traditional patterns using hedges along property lines, shade trees in yards and indigenous plants. As landscape features mature they become more important aspects of a district's character. New trees in visually prominent locations should be selected and placed so as to not obscure a building's architectural character.*

### SUSTAINABILITY JUSTIFICATION:

*Shade trees on south and west facing elevations can assist in cooling buildings in summer. Native deciduous trees can provide shade; evergreens can provide wind breaks. Use native species that are acclimated to local weather conditions including hot summers and harsh winters. Use of drought-tolerant plant species minimizes watering requirements.*

### **MAINTENANCE:**

#### ACTIONS THAT DO NOT REQUIRE REVIEW

- 2.7.1 Consult the bibliography in Appendix C for resources including "Putting Down Roots: Landscape Guidelines for the Selection, Care and Maintenance of Trees in Central Oklahoma."
- 2.7.2 Maintain plantings, especially native species that reflect patterns of historic use.
- 2.7.3 Shade trees can enhance a property's setting and improve a building's energy efficiency.
- 2.7.4: Selection of new trees and plantings should reflect the historic landscape design appropriate for the historic property and building.
- 2.7.5 Landscaping should be appropriate to the historic building and neighborhood and enhance the building and its surroundings.
- 2.7.6: Placement and species of street tree should be coordinated so as to not obscure or conflict with existing or proposed street lighting.
- 2.7.7: Existing mature trees should be protected and maintained including limbing up, removing volunteers (growth that springs up without being deliberately planted), and consulting a professional arborist to help ensure the continued tree health.
- 2.7.8: Selection of new landscape stock should take into consideration local seasonal extremes. Native plants better tolerate local conditions and usually require less supplemental watering.
- 2.7.9: Collect rain water in cisterns and rain barrels via gutters and downspouts to use for irrigation and watering. Conceal cisterns with landscaping.

- 2.7.10: Install a drip irrigation system in landscape beds to conserve water better than hand or irrigation watering. Don't use potable water to run irrigation systems.
- 2.7.11: A properly designed, installed, and maintained irrigation system conserves water usage better than hand watering. Set the irrigation controller to run the system during early morning hours to decrease evaporation and risk of biological growth on building materials.
- 2.7.12: Install an irrigation shut-off device that detects rain and freezing conditions. Prevent the irrigation system from watering when not needed. Adjust spray nozzles to deliver water only to planted areas that need it and restrict wasteful run-off on driveways and walkways.
- 2.7.13: Thoughtful maintenance of lawn areas will also help conserve water usage. Do not mow grass too short. Close-cut grass dries out and wilts, therefore requiring more watering.
- 2.7.14: Select grass types that are drought-resistant. Some drought-tolerant grasses include native Buffalo grass, Tall Fescue and Bermuda.
- 2.7.15: An alternative to turf in yards is drought-tolerant landscaping. Alternatives for lawn areas can include any combination of hardy, low-growing ground-covers (clover, ivy, mondo grass, thyme, sedum), juniper shrubs, yucca, ornamental grasses, butterfly gardens, water-permeable paths of pea gravel, water gardens, wildflowers, and decorative rocks.



*Evergreens along this privacy fence will eventually grow into a sound and privacy buffer possibly providing shade and a wind screen (left). Well planned irrigation systems can regulate water efficiency (right).*



*Eliminating the need for turf, large decorative rocks are used as accents. Native trees are preserved, providing shade across the entire back yard including the back building face (left). Water features using solar powered re-circulating pumps reduce the amount of turf in this back yard. Turf reduction through landscape design may include things like pathways, water features, permeable paving, patios, mulch beds, and borders (right).*



*Evergreens are a type of shade tree that provide effective year-round protection from direct sun (1441 NW 35th Street).*



*Shade trees should be carefully sited to provide protection from the sun and not be so overwhelming as to obscure views of a building's front facade. The house at 221 NW 26th Street illustrates an effective balance between these approaches.*

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## 2.8 FENCES AND WALLS

### POLICY:

*Preserve original or historic fences and fence walls. New fences should be of renewable materials such as wood, woven wire or brick. Vinyl fences are not appropriate.*

### DESIGN JUSTIFICATION:

*Fence walls and fences historically marked property boundaries and may have shielded private areas from public view. Historic materials such as wire, wood and brick are compatible materials; vinyl materials introduce an incompatible artificial appearance.*

### SUSTAINABILITY JUSTIFICATION:

*Preserving existing fences and fence walls saves resources. New wood fences constructed of lumber from managed forests represents use of a renewable resource. Petroleum-based vinyl fencing is not a sustainable material.*

### MAINTENANCE:

#### ACTIONS THAT DO NOT REQUIRE REVIEW

- 2.8.1: Regular maintenance of historic fences and fence walls is recommended because of the overlapping effects of sustaining the existing materials in place and preserving historic or appropriate fences.
- 2.8.2: Regular maintenance ensures the preservation of historic and appropriate fence and fence wall elements, which in turn sustains the embodied energy of the materials and eliminates the need for replacement with new materials and labor.
- 2.8.3: Original or historic fences and fence walls are important character-defining features and should be preserved and maintained.

### ADMINISTRATIVE REVIEW:

#### ACTIONS THAT REQUIRE REVIEW AND MAY BE ADMINISTRATIVELY APPROVED

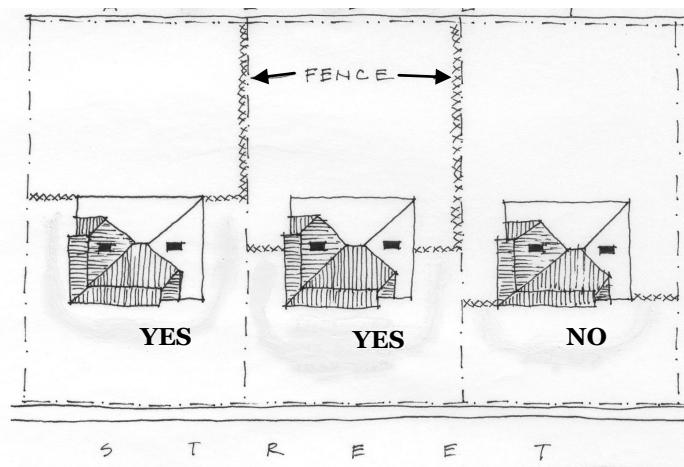
- 2.8.4: Fences and fence walls in back yards have more flexible requirements than those in side yards or those that are front yard facing because they are less visible from the public right-of-way.



*This wood privacy fence at back of 2727 Harvey Avenue is located and designed appropriately.*

- 2.8.5: Fences and fence walls are generally permitted in side, corner side, and back yards. Interior side and corner side yard fences and fence walls must be set back from the historic front building line by a distance not less than six feet. Depending on the materials and details of a fence and fence wall, additional requirements of this section may apply.
- 2.8.6: A fence or fence wall located on the street facing side yard of a corner property must be set back from the inner edge of a public sidewalk by a minimum distance of two feet, or six feet from the curb where there is no sidewalk.
- 2.8.7: If an adjacent corner property side yard has an existing fence or fence wall, then consideration shall be given to align a fence or fence wall to the same setback as that existing fence or fence wall of the adjacent corner property side yard.
- 2.8.8: Fences shall be located behind any open front porch of the main building AND the open front porch of the main building of any adjacent property.
- 2.8.9: Fences and fence walls shall be located at or behind the front 40% of the side yard of the main building unless the fence or fence wall is 75% transparent not including posts or columns spaced a minimum of eight feet apart. Depending on the design and architecture of the main building, additional requirements of this section may apply.
- 2.8.10: Opaque fences and fence walls, those that are less than 75% transparent not including posts or columns spaced a minimum of eight feet apart, shall not obscure view of significant architectural features of the primary building on the property, such as a bay window, porte-cochere, or other significant character defining building projection or feature.
- 2.8.11: Fences and fence walls are not permitted in front yards, unless supported by historical physical or photographic evidence to the contrary. If a fence or fence wall is appropriate for the front yard, then it shall match the historical configuration and approximate the historical appearance.
- 2.8.12: Fences and fence walls shall not exceed eight feet in height at the back property line or alley.
- 2.8.13: Fences and fence walls shall not exceed six feet in height on side or front facing locations.

*Fences and fence walls must be set back from the front facade of the primary building.*



- 2.8.14: Chain link or twisted wire fences shall not exceed four feet in height unless historical, physical or photographic evidence to the contrary documents them to have been taller in the proposed location.
- 2.8.15: Where residential properties are adjacent to commercial or other incompatible uses, alternative fence heights may be considered for appropriateness and with respect to other City ordinances related to fences and fence walls.
- 2.8.16: Acceptable materials for fences and fence walls are wood, brick, stone, cast iron, iron, chain link, twisted wire, painted aluminum that mimics the appearance of cast iron or iron fences, or a combination of these materials. Materials for fences and fence walls should be consistent with materials historically used at each individual property or within the historic district during the period of significance.



*Privacy fences at 609 NW 14th Street at (left) and 200 NW 31st Street (right) are designed and placed appropriately.*



- 2.8.17: Wood fences may be left unfinished or painted or stained in colors appropriate to the style and period of the property or the district. The exterior flat fence or fence wall surface, if painted, should be compatible with the color of the main building.
- 2.8.18: Decorative painting and murals shall not be applied to fence or fence wall surfaces visible from the public right-of-way.
- 2.8.19: Tops of new fences or fence walls may be horizontal, stepped, scooped, arched or parallel with the grade, as appropriate to the style and period of the main building or the historic district.
- 2.8.20: Chain link fences shall have a top and bottom rail and may be galvanized.
- 2.8.21: The side of a fence or wall facing the street or alley shall be the “finished” side.
- 2.8.22: The corners of corner properties should have partially “transparent” or open fences or fence walls to avoid complete visual enclosure along side streets.



*Side yard fences should have appropriate setback from the street, as at 2140 NW 26th Street.*

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## 2.9 PUBLIC PROPERTY AND RIGHT-OF-WAY IMPROVEMENTS

### POLICY:

*The public spaces within historic districts; for example streets, sidewalks, parks and parkways; are character-defining features and should be preserved and maintained. The City of Oklahoma City, utility companies, historic property residents, and historic property owners all play roles in maintaining these features; and the introduction of new features should be as compatible as possible with the historic districts.*

### DESIGN JUSTIFICATION:

*The existing concrete streets and sidewalks are important character defining features of the city's historic districts. The introduction of new elements in the districts such as utility meters, switching boxes or postal service mailboxes should be carefully considered for compatibility with the street-scapes and overall character of the historic properties and districts.*

### SUSTAINABILITY JUSTIFICATION:

*Maintaining parks and parkways provides permeable ground surface for rain absorption and plants for carbon dioxide generation and publicly accessible shade.*

### **ADMINISTRATIVE REVIEW:**

#### ACTIONS THAT REQUIRE REVIEW AND MAY BE ADMINISTRATIVELY APPROVED

- 2.9.1: By definition, streetscape improvements are actions beyond maintenance and have the potential to alter important characteristics of the site and setting of a historic district and property. Whenever new materials, components, or features are proposed, there will likely be sustainability considerations.
- 2.9.2: Plans for any proposed changes to or in the public right of way in or surrounding historic districts or properties, including those of telecommunications or utility providers and changes to street locations and sizes, must be submitted for review and approval using the standard application and process for a Certificate of Appropriateness.
- 2.9.3: Planning Department staff will determine the impact on the character of the historic property and district, compatibility with preservation policy and the provisions of these Standards and Guidelines, and compliance with the applicable portions of the Historic Preservation Ordinance included in Chapter 59 of the Municipal Code.
- 2.9.4: Utility components such as meters, transformers, switching boxes and other such elements must be located at the back of properties as far away as possible from sidewalks, curbs and curb cuts; of minimal height; painted to blend with the immediate environment and screened with appropriately scaled landscaping.
- 2.9.5 Plans for proposed demolition, changes or new construction in parks or playgrounds, including playground equipment, fences, picnic shelters or other structures must be submitted for review and approval using the standard application and process for a Certificate of Appropriateness.

- 2.9.6 Planning Department staff will confer with Parks and Recreation Department staff and the Park Commission in deciding the impact of proposed changes on the character of a historic property and district, compatibility with preservation policy and the provisions of these Standards and Guidelines, and compliance with all applicable ordinances.
- 2.9.7: Any proposed demolition or construction of buildings in a park must comply with the “Alterations” and “New Construction” sections of these Standards and Guidelines.
- 2.9.8: Placement of new mailboxes at curbside or in locations other than the front wall or porch of a building is not permitted in the historic districts.
- 2.9.9: Retain and maintain historic light fixtures in the public right-of-way. They may be refurbished and re-lamped to accommodate modern lighting requirements and equipment.
- 2.9.10: Lighting in the public right of way shall be uniform, and new fixtures should be compatible with the style, age and character of the district without creating a false sense of historicism. New lighting shall be compatible with existing historic lighting that remains.



*Compatible light fixtures in the 200 block of NW 31st Street (left) and 600 NW 14th Street (right) are important to maintaining the historic character of a historic district. Similarly, new light fixtures should be differentiated so as to not create a false sense of historicism.*



### **COMMISSION REVIEW:**

#### **ACTIONS THAT REQUIRE REVIEW BY THE HPC**

- 2.9.11: Some proposed actions could have more drastic effects on the appearance of a historic site or district as a whole. These actions require the filing of an application of a Certificate of Appropriateness and review by the Historic Preservation Commission.
- 2.9.12: Neither existing street pavement widths nor existing street right of way widths may be increased or decreased except by review and approval by the Historic Preservation Commission.
- 2.9.13: Street medians or esplanades may not be added or removed except by review and approval by the Historic Preservation Commission.



*Public works type projects should respect the character of neighborhood features such as the median along Shartel Avenue (above) and the Edgemere Park 35th Street bridge (below).*



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## ***Preservation Standards and Guidelines:***

### **Chapter 3**

## **ALTERATIONS TO BUILDING FABRIC AND COMPONENTS OF HISTORIC BUILDINGS**

### **3.1 MAINTENANCE, PRESERVATION AND REHABILITATION OF EXTERIOR BUILDING MATERIALS**

#### **POLICY:**

*Maintain and preserve original or historic exterior finishes and materials such as wood, brick, stone and stucco. When repair or replacement of materials is needed, consideration should be given to sustainable methods and materials that also maintain the historical visual character of a building or property.*

#### **DESIGN JUSTIFICATION:**

*The form, materials and details of exterior walls, roofs, door and window openings, and decorative details, as well as scale, texture and variety, contribute to a building's historic character. The texture, patterns and finishes of historic materials such as clay tile, slate, brick, stone, stucco and wood siding are important character-defining features; obscuring or removing these features diminishes the significance of historic buildings and structures.*

#### **SUSTAINABILITY JUSTIFICATION:**

*The exterior materials of a building represent embodied energy and preserving them helps maintain a building's architectural integrity and its embodied energy. When maintained properly, these materials can last indefinitely, eliminating the need to use new resources for their replacement. When new materials are necessary, consideration should be given to sustainability, which includes the availability of raw resources, the method and energy used to extract, transport, and process the raw resources, the*

#### **MAINTENANCE:**

##### **ACTIONS THAT DO NOT REQUIRE REVIEW**

- 3.1.1: Retain and preserve original and historic materials to sustain the historic character of a property and the embodied energy of the materials. Historic architectural features and materials that define the historic character of a building, property, or district shall be maintained in good repair.
- 3.1.2: Original or historic wood finishes must be maintained and painted (if painted historically).
- 3.1.3: Ordinary maintenance and repair typically addresses one half (50%) or less of an original or appropriate building feature, component or material on any one building face or roof, and may involve replacement of areas or parts of the building due to damage or failure of a component or material. A Certificate of Appropriateness is not required for work that meets the requirements of "Ordinary Maintenance and Repair" (See the Municipal Code, Chapter 59, Article 2).
- 3.1.4: Repairs shall be done with like materials.



*Oklahoma City's historic districts display a wide variety of original materials such as wood siding (left, 618 NW 26th Street); textured brick (center, 217 NW 31st Street); stucco and half-timbering (right, 904 NW 37th Street).*

- 3.1.5: If repairs or replacement affect more than one-half (50%) of an inappropriate component or material located on any individual building face or roof, then it is strongly encouraged that all of the inappropriate components or materials be replaced with appropriate materials. A Certificate of Appropriateness is required when all of the inappropriate materials are proposed for replacement. See “Administrative Review” below.
- 3.1.6: Peeling, flaking or failing paint should be removed from historic wood and masonry surfaces by the gentlest means possible to protect the integrity of the historic surface. Acceptable methods for paint removal include scraping, sanding, thermal removal or mild chemical strippers.
- 3.1.7: The original natural finish of brick and stone is historically important and must be preserved. Cleaning must only be undertaken to halt masonry deterioration.
- 3.1.8: The use of any abrasive, strong chemical, sandblasting or high-pressure cleaning method is not permitted, as these permanently damage the finished material surfaces and accelerate deterioration of historic masonry and wood.
- 3.1.9: Previously painted masonry surfaces may be repainted.

#### **ADMINISTRATIVE REVIEW:**

##### **ACTIONS THAT REQUIRE REVIEW AND MAY BE ADMINISTRATIVELY APPROVED**

- 3.1.10: Oklahoma City’s historic districts contain structures from a wide range of eras with varying degrees of historic significance and integrity. Changes to the exterior of any structure or site, regardless of its age, have the ability to contribute to, or to detract from, the overall character of the district and are subject to review. Changes to structures or additions built within the last 25 years or determined by the Commission to be non-historic shall be reviewed under the guidelines for New Construction.
- 3.1.11: If more than 50% of a an original feature or material on any one surface of any one face of a building, including the roof, requires repair by replacement in kind, then the scope of the work exceeds the definition of ordinary maintenance and repair and a Certificate of Appropriateness is required.



*Exteriors of stone (left, 2201 NW 25th Street), stucco (center, 3900 McKinley Avenue), and clinker brick (right, 2208 NW 25th Street) illustrate the rich variety of masonry textures found in historic districts.*

- 3.1.12: If repairs or replacement affect more than two-thirds (66%) of an inappropriate component or material located on any individual building face, then all inappropriate components or materials shall be replaced with an appropriate component or material. Removal of more than 50% of an inappropriate material no longer meets the definition of ordinary maintenance and repair, and a Certificate of Appropriateness is required.
- 3.1.13: For example, on a building with vinyl siding, if over two-thirds (66%) of this siding is to be removed from the front building face and replaced due to deterioration or damage, then all of this inappropriate siding on that building face shall be replaced with an appropriate material such as wood siding or the historic material (which is likely to be historic wood siding) shall be uncovered and restored.
- 3.1.14: Remove an inappropriate component or material and restore the original or historic component or material that is revealed by such removal.
- 3.1.15: New material should match the historic in material type, dimensions, design, configuration, texture, surface coatings and visual appearance.



*Decorative architectural features contribute to the historic character of a building and should be preserved (left, 201 NW 31st Street ; right, 500 NW 15th*

- 3.1.16: When a missing or severely deteriorated feature, element, or component is replaced, it shall be replaced in-kind, that is, matching the original in dimensions, detail, size, form, material and finish.
- 3.1.17: Incompatible non-historic alterations to a historic building are encouraged to be removed, and the building restored to its original appearance during the period of significance.
- 3.1.18: Renovations previously undertaken may conceal original or historic building fabric. When altering a historic building, non-historic alterations in the area of the proposed alteration should be removed.
- 3.1.19: If original or historic materials do not remain, the original form may be reconstructed or restored based on physical, photographic, or documentary evidence.
- 3.1.20: Original or historic masonry or stone surfaces must be maintained and not be painted, unless severe deterioration of the brick or stone can be shown to require painting and other consolidation or stabilization methods cannot be shown to be appropriate.
- 3.1.21: If masonry was previously painted, it is often not appropriate or possible to remove paint, and appropriate repainting must be considered. If color or texture of replacement brick or stone cannot be matched with existing material, as a last resort, painting may be an appropriate treatment.
- 3.1.22: Repair masonry by replacement or patching with in-kind or similar material. When this is not possible, new materials matching in texture, color and detail should be used.
- 3.1.23: New mortar used in re-pointing must match the color and composition of the original. Incompatible mortar, too high in Portland cement content, may exceed the strength of historic brick and result in acceleration of deterioration of brickwork.



*The application of vinyl siding does not allow for proper breathability of a frame dwelling and is not a sustainable material (left). After only two years, the applied polymer coating on this dwelling is already peeling (right) and the life expectancy of these materials is questionable.*

- 3.1.24: Sandblasting, high pressure power washing, the use of blow torch methods and any abrasive cleaning or stripping methods must never be used because of the resultant permanent damage.
- 3.1.25: Removal of existing synthetic materials is strongly encouraged to recover authentic historic finish and appearance of a building and its components.

### **COMMISSION REVIEW:**

#### ACTIONS THAT REQUIRE REVIEW BY THE HPC

- 3.1.26: Historic architectural features and materials should be retained and preserved when adapting the building to contemporary use.
- 3.1.27: If replication of original elements is not possible because of a lack of historical physical, photographic or documentary evidence, then a new design that is compatible with the original form, style, and period of the building shall be used.
- 3.1.28: An appropriate option for a replacement feature is a new design that is compatible with the remaining character-defining features of the historic building.
- 3.1.29: The new design of a missing feature shall take into account the size, scale, and materials of the historic building; should be clearly differentiated to avoid a false historical appearance; and should maintain visual attention on the authentic and historic aspects of the building.
- 3.1.30: New compatible designs for missing features should be reversible so that they can be replaced with a more appropriate design in the event that better and more accurate historical evidence becomes available.
- 3.1.31: Synthetic siding materials such as vinyl and aluminum bear little resemblance to historic siding materials and are not sustainable. The application of such materials is not appropriate and will not be approved in historic districts.
- 3.1.32: Exterior insulation finish systems, curtain wall, concrete block, imitative brick or stone or gravel aggregate materials shall not be used as replacement exterior wall materials.
- 3.1.33: The removal of metal or vinyl siding may allow the recovery of original or historic decorative elements such as cornices, brackets, and window and door trim that have been damaged or removed when the synthetic materials were installed. Recovery of such details should be based on physical or photographic evidence first, and based on similar details for buildings in the block or district second.
- 3.1.34: Installation of fiber cement products may be appropriate for rear or side elevations not readily visible from the public right-of-way in order to replace wood siding that is missing or deteriorated beyond repair in all districts except the Heritage Hills Historic and Architectural District. If determined appropriate then the fiber cement siding shall be consistent with the size, pattern, shape, dimensions and texture of the historic wood siding. Fiber cement products are considered sustainable products.
- 3.1.35: The use of composite wood siding is discouraged since these products do not appropriately imitate the appearance of wood siding, and toxins are used in their manufacturing.

- 3.1.36: Products of polymer coatings (“liquid siding”) should be avoided since the life expectancy and breathability of these coatings is unknown. The application of these coatings often requires the abrasive cleaning of the historic surface which is not allowed.

### 3.2 PAINT FOR EXTERIOR PAINTED SURFACES

#### POLICY:

*Paint and paint colors are usually not subject to review. Property owners are encouraged to research the specific historic colors of the exterior of the buildings on their property, record their findings for future reference, and select colors that are appropriate to the historic building and district.*

#### DESIGN JUSTIFICATION:

*Property owners are encouraged to select exterior paint colors that best suit the architectural style and historic character of the building.*

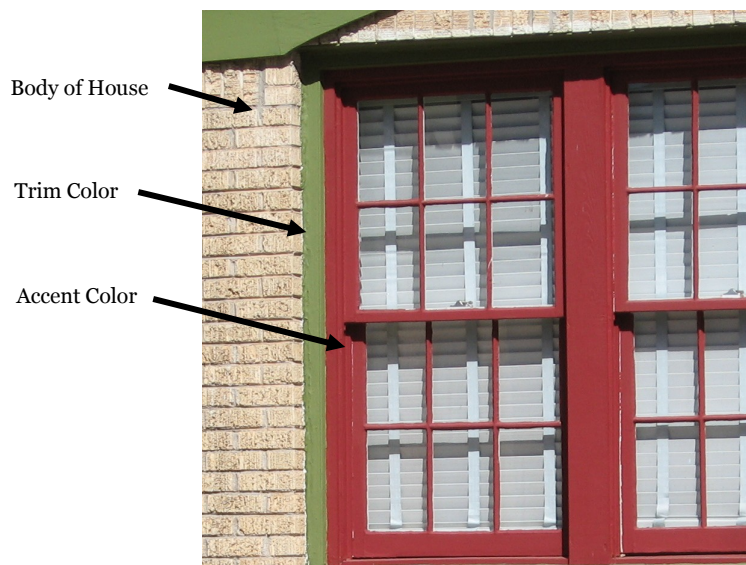
#### SUSTAINABILITY JUSTIFICATION:

*Paint and other building materials such as sealants, caulk and varnishes can emit hazardous gasses known as volatile organic compounds (VOCs). It is recommended that property owners seek out and use low-VOC products.*

#### MAINTENANCE:

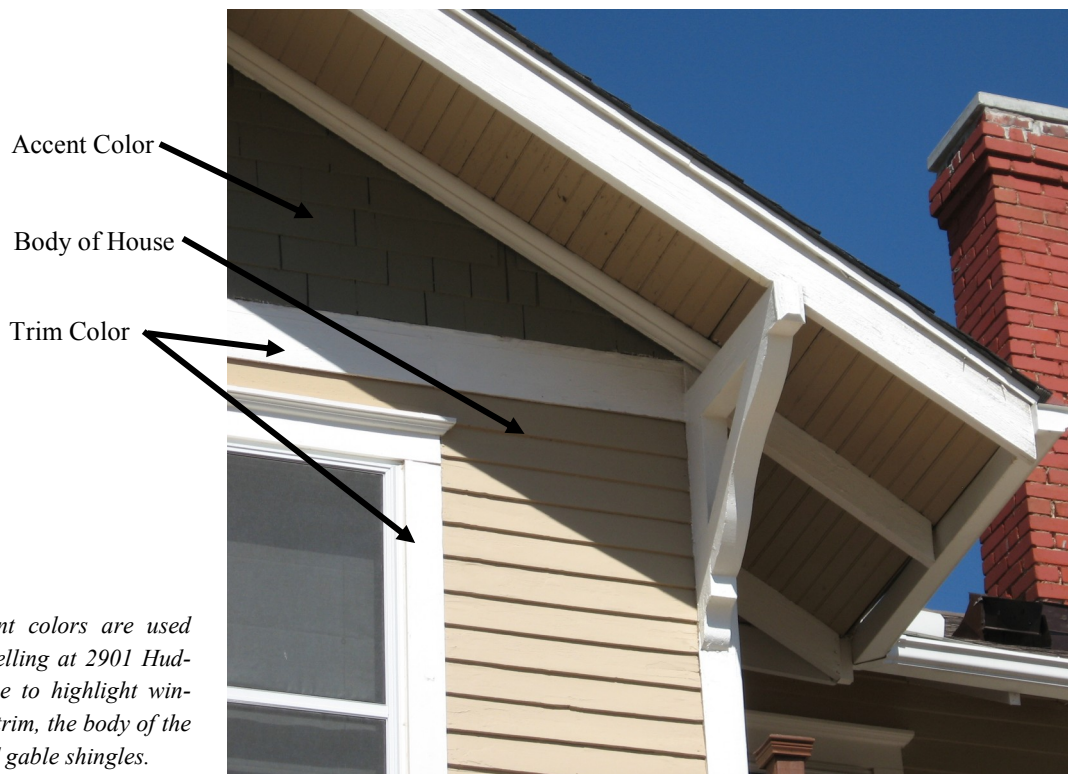
##### ACTIONS THAT DO NOT REQUIRE REVIEW

- 3.2.1: Selection of paint and stain colors based on research of specific historic finishes associated with a specific building is encouraged. While it is informative to know the historic paint colors used, these colors may not be considered currently fashionable or appropriate. Paint, as a material finish on wood, is considered temporary and may reflect current trends in the district and preferences of the current owner.
- 3.2.2: Do not use metallic, fluorescent or neon paint colors on any surface.
- 3.2.3: If historic exterior paint colors are determined, it is encouraged that these be documented for future reference and as a historic record. Retain a sample at an exterior location hidden by landscaping or find a matching color swatch for historic body, trim and accent colors.



*Paint vocabulary for windows.*

- 3.2.4: Paint colors should complement each other and respectfully accentuate the building's significant features.
- 3.2.5: In general, paint colors for Queen Anne dwellings were highlighted by multi-color paint schemes in deep rich hues, while the soft, pastel body colors of Colonial Revival buildings were usually trimmed with white or soft cream. Craftsman style buildings often combined exterior colors in warm, rich earth tones, and the light colored walls and red tile roofs of Mission and Spanish Colonial dwellings were offset by contrasting trim colors.
- 3.2.6: Use variations in paint color to reflect variations in material on a building's exterior.
- 3.2.7: Painting of previously unpainted masonry (e.g. brick or stone) is not allowed, as paint eliminates the inherent color variation of masonry that was a conscious part of the original design for the building and also initiates a continuing cycle of paint maintenance. Also, paint may trap moisture that can lead to the deterioration of masonry.
- 3.2.8: When repainting already painted brick or stone, colors may be selected to echo the original colors of the brick or stone. Repainting of previously painted masonry is encouraged, rather than attempts to remove paint, which may cause further damage to the underlying masonry surfaces.
- 3.2.9: Most paint manufacturers produce palettes of historic colors that were typically found on homes of specific time periods or architectural styles. These palettes are useful, research-based guides to historically accurate paint schemes, are tools to learn more about appropriate painting schemes, and can provide good reference information for selection of paint colors.







*This American Foursquare dwelling at 610 NW 17th Street uses paint colors to highlight trim, porch columns and windows.*

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### 3.3 PORCHES, CANOPIES, PORTE-COCHERES & BALCONIES

#### POLICY:

*Historic porches, canopies, porte-cocheres and balconies are important features and are often the dominant characteristic of a building. These features that are visible from the public right-of-way should not be altered.*

#### DESIGN JUSTIFICATION:

*Front porches and canopies connect a building to its context by orientating the primary entrance to the street. The various components of porches, canopies, porte-cocheres, and balconies, including steps, railings and columns, provide scale and detail to historic buildings.*

#### SUSTAINABILITY JUSTIFICATION:

*Porches, canopies, and porte-cocheres protect entrances, provide shade, and enhance a building's energy efficiency.*

#### **MAINTENANCE:**

##### ACTIONS THAT DO NOT REQUIRE REVIEW

- 3.3.1: Maintaining porches, canopies, porte-cocheres and balconies, preserves and sustains their embodied energy and eliminates the need for replacement with new resources.
- 3.3.2: Preserve existing historic front porches, canopies, porte-cocheres, balconies, and their components because they are character-defining features of a building.
- 3.3.3: Ordinary maintenance and repair such as cleaning, painting, and making minor repairs through replacement in kind with like materials is encouraged and does not require review as long as less than 50% of an element or feature on any one side of the building is replaced.
- 3.3.4: Preserve historic components of porches including steps, ceiling, flooring, railings and columns.



*The recessed arcaded porch (229 NW 31st Street, left) and the gable front porch on this bungalow (709 NW 27th Street, right) are character-defining features and should be preserved.*

## Porches and Balconies

### **COMMISSION REVIEW:**

#### ACTIONS THAT REQUIRE REVIEW BY THE HPC

- 3.3.5: Enclosing a historic front porch significantly alters the character of a building and is not permitted. Creating a false historical appearance through the application of new elements and details to a porch or balcony is inappropriate. Reopening and restoring an enclosed front porch is encouraged.
- 3.3.6: Enclosing a historic side porch or balcony with screen panels to create a “screened in porch” was frequently done to create spaces that could be used year-round and provide some privacy and protection from insects. Such enclosures may be allowed if designed in a manner that is compatible with the style of the building and if important character defining historic fabric is not obscured.
- 3.3.7: Enclosing historic side or back porches or balconies with glazing changes the historic character of a building and should be avoided. However, while not encouraged, such enclosures at side or back porches not connected to a front or primary porch or balcony may be allowed. The details of such enclosures must be minimal and not obscure or detract from the historic details of the porch or building.



*Screened porches, as at 837 NW 38th Street, left, and 507 NW 19th Street, right, are appropriate examples of enclosing porches with minimal structural framework.*

- 3.3.8: Reconstruction of a missing porch, canopy, porte-cochere or balcony is encouraged and must be based on accurate physical evidence of the original or historic configuration, placement and detail of the feature and supplemented with historic photographs that show the original feature.
- 3.3.9: If no photographs or other documentation exist, the design of a replacement porch should be compatible with the historic building in height, proportion, style, roof shape, material, texture, detail and color. Buildings of a similar architectural style can provide examples of appropriate design.

### Porch Elements – Columns & Railings, Ceiling & Flooring, Stairs

#### MAINTENANCE:

##### ACTIONS THAT DO NOT REQUIRE REVIEW

- 3.3.10 Routine maintenance ensures the preservation of porch elements, sustaining their embodied energy and negating the need for replacement with new resources.



*Porch components such as columns and railings are important character-defining features. These elements may be simple in design (typical in Folk Victorian dwellings), more ornate as in Queen Anne styles, or articulated as in Arts & Crafts dwellings: left, 605 NW 26th Street, the tapered wood post on a square brick pier is a typical design for a Bungalow; center, stairs at 610 NW 17th Street are of appropriate design and materials; right, 1549 NW 37th Street, Colonial Revival dwelling with Tuscan porch column.*

#### COMMISSION REVIEW:

##### ACTIONS THAT REQUIRE REVIEW BY THE HPC

- 3.3.11: If more than 50% of a material or component is deteriorated beyond repair, replacement may be required. When new materials may be introduced, there are likely sustainability considerations.
- 3.3.12: New or replacement columns should be of materials appropriate to the style and design of the building including the porch. Replacement columns should match the original or historic columns in size, design, scale, massing, materials and details.
- 3.3.13: The dimensions and proportions of replacement balusters must match the historic porch. The spacing and height of railing balusters is important to the character of the historic building with typically closely spaced balusters and relatively low railings (30" or less in height). Although this height may not conform with current codes, existing historic railings are permitted to remain until they are too deteriorated to be retained and repaired, therefore it is critical to retain the historic porch balustrade and railings.

3.3.14: The use of alternative materials for porch columns on primary facades such as fiberglass may be approved by the Commission if the finished appearance will be indistinguishable from the appearance, design, and texture of the original or historic columns.

3.3.15: Porch columns of vinyl or hollow core aluminum, or wrought iron are not appropriate unless historic documentation demonstrates otherwise.



*Original porch balusters (609 NW 14th Street, left, and 712 NW 24th Street, right) are character-defining and should be preserved and maintained.*

## Ceilings & Floors

### MAINTENANCE:

#### ACTIONS THAT DO NOT REQUIRE REVIEW

- 3.3.16: Preserve and maintain original or historic porch ceiling and flooring materials. Ordinary maintenance and repair (less than 50% replacement of an element) do not require review.
- 3.3.17: Ceilings and soffits were often finished with painted beaded board or other types of tongue and groove boards. These historic materials provide important scale and detail and must be preserved and maintained. Common colors for porch ceilings were “sky blue” or white.
- 3.3.18: Preserve and maintain original or historic porch floors such as wood, concrete or tile. Do not paint, stain or cover original porch floors with “wall-to-wall” or glued down carpet or other surface materials. Area rugs may be used and are non-permanent as long as they are not permanently affixed.
- 3.3.19: Previously painted porches may be repainted. Property owners should photo-document existing porch before repainting so as to maintain a continuous record of the property.

### ADMINISTRATIVE REVIEW

#### ACTIONS THAT REQUIRE REVIEW AND MAY BE ADMINISTRATIVELY APPROVED

- 3.3.20: If more than 50% of a porch ceiling, soffit or floor requires repair by replacement, use materials to match the historic materials in all details, dimensions, and configuration and first consider replacement in kind for a new porch floor.

**COMMISSION REVIEW:****ACTIONS THAT REQUIRE REVIEW BY THE HPC**

- 3.3.21: Replacement wood porch flooring must closely match the details and dimensions of the historic wood flooring. For example, do not use over-sized materials such as two-inch thick boards for porch floors that would have historically been ¾” to 1” thick tongue-and-groove boards.
- 3.3.22: Alternative materials such as plastic-wood composites may be appropriate for porch floors. Although derived from plastic, many companies use substantial amounts of recycled plastic and these materials often have lengthy warranties. The appropriateness of composite floors will be dependent upon their visibility from the street and ability to match the color, texture and dimensions of the original or historic porch surface materials. Composites will only be considered for back and side porches set back more than 60% of the length of the side of the building. Composites for porch flooring are not permitted in the Heritage Hills Historic and Architectural



*Composite porch surfaces may be appropriate since they are generally not readily visible from the street and can closely approximate the appearance of wood.*

**Stairs****MAINTENANCE:****ACTIONS THAT DO NOT REQUIRE REVIEW**

- 3.3.23: Preserve and maintain existing historic stairs leading to porches. Ordinary repair that involves replacement in kind for less than 50% of a particular type of feature or material does not require review as long as the replacement parts match in all aspects the deteriorated materials.
- 3.3.24: Whether concrete, brick, wrought iron or wood, regular maintenance of original or historic stairs will prevent the need for review and replacement.

**ADMINISTRATIVE REVIEW:****ACTIONS THAT REQUIRE REVIEW AND MAY BE ADMINISTRATIVELY APPROVED**

- 3.3.25: Replacement equates with removal of more than 50% of the original or historic material of any porch element. Replacement materials must be in-kind, for example use wood to replace wood stairs and concrete to replace concrete stairs.

**COMMISSION REVIEW:****ACTIONS THAT REQUIRE REVIEW BY THE HPC**

- 3.3.26: Original or historic porch stairs should not be removed. If repair by replacement is needed because the stairs are deteriorated beyond repair, replacement should be in kind. New porch stairs should match the original as closely as possible in appearance, design, size, detail and materials. If new stairs are needed where not located originally, the design should be modest and be appropriate for the style of the building.



*Many porch railings used for Oklahoma City's Tudor Revival style houses were built of wrought iron and these materials should be preserved and maintained. If replacement is necessary, new railings should match the original design (2133 NW 28th Street, left, and 1005 NW 38th Street, right).*



*New porch stairs should be simple in design such as at 616 NW 26th Street.*



## Porch Canopies

### **MAINTENANCE:**

#### ACTIONS THAT DO NOT REQUIRE REVIEW

- 3.3.27: Canopies, projecting roof structures that project from a building and shelter entrances, are usually supported by metal rods, chains, wires, or columns of wood or metal. They are historically important, character-defining features and they are appropriate for use in Oklahoma City's historic districts.
- 3.3.28: Routine maintenance ensures the preservation of canopies and reduces the need for replacement with new resources.
- 3.3.29: Property owners are encouraged to maintain canvas canopies and ordinary maintenance and repair does not require review. Metal canopies added in the mid- to late-20th century should also be maintained.



*The use of canvas canopies is appropriate to provide shade for porches as at 837 NW 17th Street (left). Metal awnings such as at 301 NW 42nd Street (right) are more appropriate for back elevations.*

### **ADMINISTRATIVE REVIEW:**

#### ACTIONS THAT REQUIRE REVIEW AND MAY BE ADMINISTRATIVELY APPROVED

- 3.3.30: Treated acrylic fiber canvas canopies can last more than 10 years, compared with 3-5 years for polyester or vinyl. Unlike metal canopies, canvas canopies can be of retractable design, allowing sunlight through windows for passive heat during winter.
- 3.3.31: Metal canopies may be added at back or side elevations not readily visible from the street.

### **COMMISSION REVIEW:**

#### ACTIONS THAT REQUIRE REVIEW BY THE HPC

- 3.3.32: Reconstruction of a missing canopy should be based on accurate evidence of the original configuration, placement and detail and supplemented with historical photographs.
- 3.3.33: If no documentation is available, a new design that is compatible with the historic building in height, proportion, style, roof shape, material, texture, detail and color is appropriate.
- 3.3.34: Buildings of similar architectural style can provide examples of appropriate new canopy design.

**Porte-cocheres****MAINTENANCE:****ACTIONS THAT DO NOT REQUIRE REVIEW**

- 3.3.35: A porte-cochere is a covered area over a driveway at a side entrance and physically attached to a building. Porte-cocheres are historically important features and are a dominant characteristic where they occur. The various components of porte-cocheres, including roof, columns, railings and steps, provide scale and detail to historic buildings. Porte-cocheres may be an extension of a porch roof or be an independent feature attached to the building.
- 3.3.36: Maintenance of porte-cocheres ensures their preservation, sustaining their embodied energy and negating the need for replacement with new resources.
- 3.3.37: Do not eliminate or enclose a porte-cochere because such actions would significantly alter the character of the building.
- 3.3.38: Do not create a false historical appearance through the application of new elements and details to a porte-cochere. Do not add a porte-cochere to a building where none historically existed.



*The porte-cochere at the end of the driveway at 315 NW 17th Street is an important character defining feature of the building.*

**COMMISSION REVIEW:****ACTIONS THAT REQUIRE REVIEW BY THE HPC**

- 3.3.39: Reconstruction of a missing porte-cochere must be based on accurate evidence of the original configuration, placement and detail and supplemented with historic photographs that show the original or historic porte-cochere.
- 3.3.40: If no photographs or other documentation is available, a new design that is compatible with the historic building in height, proportion, style, roof shape, material, texture, detail and color is appropriate. Buildings of a similar architectural style can provide examples of appropriate new porte-cochere design.

### 3.4 PERGOLA OR FREESTANDING TRELIS (See also 2.5, Landscape and Landscape Elements)

#### POLICY:

*A pergola or freestanding trellis, as original historic building elements, are historically important features and should be retained and preserved. A trellis is a freestanding grid that is used to define or screen outdoor spaces.*

#### DESIGN JUSTIFICATION:

*As popular features for Bungalow, Craftsman and other early 20th century building styles, pergolas and freestanding trellis, contribute to the historic character of a building and convey its age and style.*

#### SUSTAINABILITY JUSTIFICATION:

*The use of a pergola or freestanding trellis helps to provide shade to a building and uses screening through vegetation rather than other materials.*

*The pergola is a significant defining feature to the front of this dwelling (438 NW 17th Street).*



#### **MAINTENANCE:**

##### ACTIONS THAT DO NOT REQUIRE REVIEW

- 3.4.1: Preserve and maintain original or historic pergolas and freestanding trellis. Ordinary maintenance and repair does not require review.
- 3.4.2: Up to 50% of an original or historic pergola or freestanding trellis may be repaired by replacement without review only if the alteration results in no change in materials, dimensions, design, configuration, texture, surface coatings or visual appearance.

#### **COMMISSION REVIEW:**

##### ACTIONS THAT REQUIRE REVIEW BY THE HPC

- 3.4.3. Do not add a new pergola or freestanding trellis on a prominent (visible from the public right-of-way) elevation where none existed historically.
- 3.4.4: A missing pergola or freestanding trellis may be reconstructed if based on accurate evidence of original configuration, placement and detail as supported by historic photographs.

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### 3.5 DOORS AND ENTRIES

#### POLICY:

*Doors and entrances are important aspects of the architectural character of a building. Historic doors and entries should be retained and preserved.*

#### DESIGN JUSTIFICATION:

*The proportion, shape, location, pattern and size of doors contribute significantly to the historic character of a building and help convey the style and period of the building.*

#### SUSTAINABILITY JUSTIFICATION:

*Preserving original or historic doors is part of the overall sustainability of the building and they should be made air-tight with proper weather-stripping. Storm doors help to enhance energy conservation. Blower-door tests, preformed as part of an energy audit, can document air leaks that should be sealed.*



*Character-defining doors: Craftsman style at 912 NW 16th Street, left; arched Tudor Revival style at 2706 Robinson, center; arched Spanish Colonial Revival style at 3900 McKinley Avenue, right.*

#### **MAINTENANCE:**

##### ACTIONS THAT DO NOT REQUIRE REVIEW

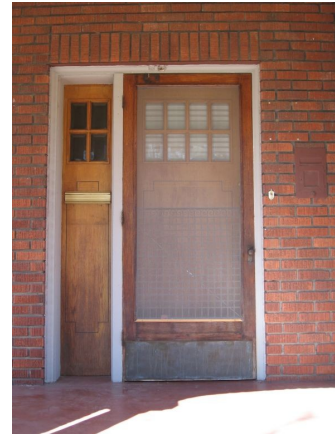
- 3.5.1: Regular maintenance and weatherstripping of historic doors helps to ensure their preservation and improves the energy efficiency of the building.
- 3.5.2: Preserve original or historic doors, openings and architectural features. Preserve and protect original or historic sidelights, transoms and fanlights surrounding a more formal entry.
- 3.5.3: Repair original or historic doors instead of replacing them. Properly maintained, they will have greatly extended service lives while contributing to the historic character of the building.

**ADMINISTRATIVE REVIEW:****ACTIONS THAT REQUIRE REVIEW AND MAY BE ADMINISTRATIVELY APPROVED**

- 3.5.4: The design of replacement doors shall be based on historic documentation, if available, and shall reflect the style and period of the building. Replacement doors shall be compatible with historic doors in proportion, shape, location, pattern, size, materials, and details.
- 3.5.5: Preserve existing historic door openings, do not enlarge or diminish to fit stock door sizes.
- 3.5.6: Unless documentation is provided to demonstrate other materials were historically used on a building, primary (usually the front door) entrance doors shall be wood.
- 3.5.7: New door openings at back elevations are permitted and shall minimize damage to the original design of the building and character-defining features.
- 3.5.8: New door openings in the front facade of a primary building are not permitted.
- 3.5.9: New door openings on side elevations may be permitted only in the back 30% of the length of the side elevation and are not permitted on the street-facing side elevation of corner properties.
- 3.5.10: If new openings are necessary due to code requirements or other reasons, they may be considered under unique circumstances and must be compatible with existing door openings in proportion, shape, location, pattern, size and material.
- 3.5.11: Alternative materials for doors and door frames such as composite wood and aluminum clad wood, may be considered for side and back door locations except for the Heritage Hills Historic and Architectural District for which only wood doors are permitted.
- 3.5.12: Security bars on doors must not be visible.

**Storm and Screen Doors**

- 3.5.13: A storm or screen door visible from the public right-of-way shall be limited to one intermediate rail.
- 3.5.14: Storm or screen doors shall be stained or painted. It is customary for the color of the storm or screen door to match the color of the primary door or the color of the surrounding door trim.



*A storm door added on front facades should be a full-view design and fit the door opening such as at this Tudor Revival style at 517 NW 42nd Street (left) and this Craftsman style at 605 NW 26th Street (center). Original screen doors should be preserved and maintained (2601 Hudson Avenue, right).*

- 3.5.15: Storm or screen doors not visible from the public right-of-way may have transparent glass or screen portions that are less than 65% of the total exterior face area of the door.
- 3.5.16: Preserve original or historic screen doors. If these are removed to allow the installation of storm doors, it is strongly encouraged that these be retained for possible future use.
- 3.5.17: A new wood screen door may be installed to replace an existing or historic wood screen door in which case it shall match the design, detail, and finish of the existing or historic wood screen door.
- 3.5.18: A new wood screen door may be installed where no wood screen door has previously existed.
- 3.5.19: A new wood screen door shall be compatible with the historic character of the building and differentiated so as to not present a false historical appearance.
- 3.5.20: A new screen door shall maximize the view of the existing door, while not damaging or obscuring the door and frame of the opening it is intended to protect.
- 3.5.21: The stiles and rails of a screen door shall be equal to or less than the width of the stiles and rails of the existing door.
- 3.5.22: For an existing door with no discernible stiles or rails the screen area of a proposed screen door shall be equal to or greater than 65% of the total exterior face area of the proposed screen door.
- 3.5.23: A screen door may be removed to allow the installation of a storm door. It is strongly encouraged that a historic screen door be retained for possible future reuse at the same location.
- 3.5.24: Storm doors must have full glazed panels (clear glass) to maximize the view of the existing door, while not damaging or obscuring the door and frame. Ensure storm doors have good weatherstripping.
- 3.5.25: A storm door shall maximize the view of the existing door, while not damaging or obscuring the door or frame of the opening that it is intended to protect.
- 3.5.26: The stiles and rails of a storm door shall be equal to or less than the width of the stiles and rails of the existing door.
- 3.5.27: For an existing door with no discernible stiles or rails the glass area of a proposed storm door shall be equal to or greater than 65% of the total exterior face area of the proposed storm door.
- 3.5.28: The transparent area of a storm door may accommodate a glass panel or screen panel.
- 3.5.29: Installation of full-view storm doors are encouraged for improved energy efficiency while maintaining view of the historic character-defining entrance door.

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### 3.6 WINDOWS, SHUTTERS AND AWNINGS

#### POLICY:

*Windows and shutters are important character-defining features of a building and originals should be retained and kept in good repair. Awnings may be an intended permanent character defining feature such as wood framed and finished with roof shingles to match the rest of the building or temporary such as contemporary fabric awnings with aluminum frames.*

#### DESIGN JUSTIFICATION:

*The proportion, shape, location, positioning, pattern and size of windows contribute significantly to the historic character of a building and help convey the architectural style and period of the building. Their design, details and craftsmanship make them worthy of preservation. The presence or absence of shutters and awnings are significant to the visual character of a building.*

#### SUSTAINABILITY JUSTIFICATION:

*Many buildings in historic districts retain old-growth wood windows which can last indefinitely if they are properly maintained, unlike new-growth wood or vinyl windows. In most cases, windows account for less than one-fourth of a home's heat loss. Insulating the attic, walls and basement is a more economical approach to reducing energy costs than replacing historic windows. Proper maintenance and sealing of windows, along with adding storm windows, keeps windows out of landfills and enhances a building's energy efficiency year round.*



*Original windows help define the architectural style and character of a building. Original windows at 819 NW 26th Street (upper left), 917 N Shartel Avenue (lower left), and 229 NW 32nd Street (right).*



**MAINTENANCE:****ACTIONS THAT DO NOT REQUIRE REVIEW**

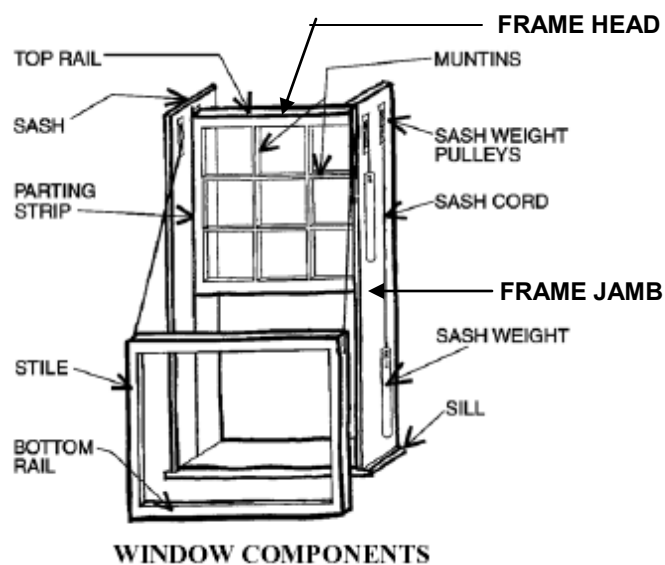
- 3.6.1: Regular maintenance and weather-stripping of historic windows ensures their preservation and improves the energy efficiency of a building.
- 3.6.2: Retain and preserve original or historic windows. Preserve and maintain historic window framing and number and configuration of glass panes.
- 3.6.3: Make repairs to an existing window rather than replacing the entire window unit, including replacement in kind of parts that are deteriorated beyond repair. Ordinary maintenance and repair is limited to less than 50% replacement of the window's components and parts including frames and sashes.

**ADMINISTRATIVE REVIEW:****ACTIONS THAT REQUIRE REVIEW AND MAY BE ADMINISTRATIVELY APPROVED**

- 3.6.4: The application of ultraviolet (UV) film to window glazing is the least costly option for reducing heat gain from sunlight and may be an acceptable addition to window glass. UV filters can have a service life of ten or more years; when replacement of the film is required, great care must be taken not damage to historic glass and framing.

**COMMISSION REVIEW:****ACTIONS THAT REQUIRE REVIEW BY THE HPC**

- 3.6.5: Original or historic windows more than 50% DETERIORATED BEYOND REPAIR may be replaced in kind.
- 3.6.6: New window openings may be allowed on the back facade or the back 30% of the side elevations. New windows must be compatible with historic or existing windows in proportion, shape, location, pattern, size, materials and details.



*Become familiar with parts of a window (above).*

- 3.6.7: If an original opening is presently blocked, consider reopening it. The replacement of non-historic incompatible windows with windows that are more historically appropriate is encouraged.
- 3.6.8: When window replacement is necessary, do so within the existing historic opening. Use the same frame size to avoid filling in or enlarging the original opening.
- 3.6.9: If original or historic windows can be demonstrated to be deteriorated beyond repair and must be replaced, new windows shall match all of the characteristics of the historic window, including muntins pattern and profile.
- 3.6.10: New windows made of aluminum clad wood with enameled finish may be appropriate as replacements for historic wood windows since these may have acceptable sustainable qualities and closely resemble a painted finish.
- 3.6.11: Vinyl is not an environmentally sustainable material, and the installation of vinyl-clad wood windows or entirely vinyl framed windows is not appropriate and will not be approved for the historic districts.
- 3.6.12: Thermal pane (also known as insulated glazing) windows are acceptable as replacement windows when the historic windows in a building have been previously removed. When used, thermal pane windows must have true divided lites.



*Steel casement windows (left: 801 NW 40th Street and 2240 NW 27th Street, right) can be replaced in-kind, if necessary. Steel window manufacturers offer rust-proof galvanized models in custom colors that may never require re-painting.*



- 3.6.13: A thermal pane window may be appropriate for replacement of a historic wood or metal window when the existing window frame and sash parts are more than 50% deteriorated beyond repair. To replace a historic window with a new unit a window survey including a photograph of the interior and exterior of the unit must be provided to substantiate the condition of the window. Historic windows visible from the public-right-of-way must be retained and repaired or replaced in kind, including replication of muntins pattern and profile.
- 3.6.14: Fanlights and sidelights at entrances can be retrofitted for improved thermal performance. Because these features are at eye level, the integration of films, new glazing or panels should be carefully detailed.
- 3.6.15: Muntins sandwiched between layers of glass, snap-on muntins, and surface-applied muntins are not appropriate and shall not be used.
- 3.6.16: Clear glass shall be used in all windows.



*Storm windows at 217 NW 31st Street (left) and 533 NW 37th Street (right) provide thermal efficiency as well as most new replacement windows. Storm windows should be of full-view design or have the structural framework align with the original window meeting rail.*



- 3.6.17: Reflective, tinted, patterned or sandblasted glass are not permitted in windows, except that special glass, for example, patterned, leaded or colored glass, can be used in transoms and sidelights when appropriate as established by the architectural style and the specific history of the building for which the special glass is proposed.
- 3.6.18: A new window may have a low emissivity coating applied to clear glass provided that the visible light transmittance is not less than .74 and the overall reflectance is not more than 17%.
- 3.6.19: Security bars must be installed only on the interior of windows.
- 3.6.20: If an interior dropped ceiling is lower than the top of the window, the ceiling must be stepped back from the window to not obscure the top of the window from outside view.

### **Storm Windows**

Many styles of storm windows are available to improve the thermal performance of existing windows. Exterior storm windows are thermally efficient, cost-effective, reversible, and allow the retention of original or historic windows. Storm window frames should align with the existing window frames.

### **MAINTENANCE:**

#### **ACTIONS THAT DO NOT REQUIRE REVIEW**

- 3.6.21: Existing storm windows should be regularly maintained and painted as needed.
- 3.6.22: If metal storm windows are installed, paint to blend with surrounding elements (typically the window frame and sashes) to create minimal visual impact. The visual impact of storm windows may be minimized by selecting colors that match existing trim color and window styles.

### **ADMINISTRATIVE REVIEW:**

#### **ACTIONS THAT REQUIRE REVIEW AND MAY BE ADMINISTRATIVELY APPROVED**

- 3.6.23: Storm window frames must have a narrow perimeter framing that conforms to the primary window opening.
- 3.6.24: Do not use unfinished or clear anodized aluminum frames storm windows. If these are already on a house, consider painting these to complement or match the window color.
- 3.6.25: Storm windows may have an integral screen component.
- 3.6.26: Interior storm windows are encouraged.

### Screened Windows

#### MAINTENANCE:

##### ACTIONS THAT DO NOT REQUIRE REVIEW

- 3.6.27: Most historic houses originally had window screens to allow ventilation, keep out insects, and provide a minimal amount of security.
- 3.6.28: Historic window screens had a wood frame with inset wire screening that could be removed and replaced when worn out or damaged.
- 3.6.29: Historic screen windows should be preserved. If they are removed to allow the installation of storm windows, it is strongly encouraged the original screen windows be retained for possible future reuse.

*This window at 530 NW 14th Street has an original screen panel to allow for fresh air to enter the dwelling, helping to reduce energy costs.*



#### ADMINISTRATIVE REVIEW:

##### ACTIONS THAT REQUIRE REVIEW AND MAY BE ADMINISTRATIVELY APPROVED

- 3.6.30: New screen windows frames must be of wood, and match the profile, size and design of the historic frame or typical window screen frames in the historic district. New screens shall be of a color, material, and screen size that they are still transparent enough for the window behind them to be visible from the public right-of-way.

### Shutters

#### MAINTENANCE:

##### ACTIONS THAT DO NOT REQUIRE REVIEW

- 3.6.31: Historic shutters should be preserved and maintained.
- 3.6.32: Shutters on historic building may have been functional and decorative in design. Operable shutters could be closed during summer days to reduce heat light and heat. New shutters may be functional, decorative, or both.



*Preserve original decorative shutters like the ones at 905 NW 37th Street (left) and 829 NW 38th Street (right).*



**ADMINISTRATIVE REVIEW:**

## ACTIONS THAT REQUIRE REVIEW AND MAY BE ADMINISTRATIVELY APPROVED

- 3.6.33: Shutters are only permitted where they existed historically, and where they are appropriate to the style and character of the house. Inappropriate shutters are encouraged to be removed.
- 3.6.34: Shutters must be half the width of the window and mounted to be or appear operational.

**Awnings****MAINTENANCE:**

## ACTIONS THAT DO NOT REQUIRE REVIEW

- 3.6.35: Awnings on windows and doors provide shade and help reduce heat gain and the need to lower the thermostat setting on hot days.
- 3.6.36: Retractable awnings allow sunlight into windows for passive heat gain during the winter. Unretractable awnings can provide a wind break during the winter and reduce air infiltration through windows and doors.
- 3.6.37: Maintain and preserve historic awnings that contribute to the historic character of a building and help reduce energy use.
- 3.6.38: Retain and preserve the material integrity of existing historic awnings, which can be wood, metal or fabric with wood or metal frames.

**ADMINISTRATIVE REVIEW:**

## ACTIONS THAT REQUIRE REVIEW AND MAY BE ADMINISTRATIVELY APPROVED

- 3.6.39: Awnings shall be placed so as to avoid obscuring details of a building facade.
- 3.6.40: New awnings installed at a property where awnings have not been documented before must be made of canvas or other fabric material on a metal frame, and may be either fixed, retractable or operable.
- 3.6.41: New wood awnings may be installed provided that documentation regarding their use historically at the property or in the district is presented and their use is consistent with the style of and location on the building for which they are proposed.
- 3.6.42: Plastic awnings are not permitted.
- 3.6.43: Metal awnings may be used if the size, color and design are compatible with the district and architectural style of the building.
- 3.6.44: Generally inappropriate, plastic or metal awnings that existed prior to a district or property being zoned HP or HL may remain and shall be kept in good repair. Inappropriate awnings that are not kept in good repair shall be removed in their entirety.



*An arched awning is appropriate for a arched opening (left, 2109 NW 25th Street). A drop front or shed awning is appropriate for rectangular openings (right, 2141 NW 25th Street).*



- 3.6.45: Fabric or canvas awnings must be a "drop-front" or "shed" style, except at arched window openings.
- 3.6.46: Consider the longevity of the fabric selected for awnings. Woven acrylic fiber awnings can withstand 25 mph winds and usually last 8-12 years, compared with 5-6 years for polyester or vinyl awnings.
- 3.6.47: Awnings shall not be continuous across a facade, but rather relate to each window or bay. Awnings should most often be located over individual windows or paired windows.



*Above: Awnings at 915 NW 14th Street are appropriate in their coverage and application individually to the windows. Below: at 521 NW 37th Street the dwelling uses appropriate awnings at the entrance and windows as well as a large awning to shade the porch above the garage.*



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### 3.7 ROOFS

#### POLICY:

*Retain original roof shape, details, and materials when possible. When replacing roofing materials, consider the energy used in their manufacture and transportation, the reflectivity of the material and whether the material derives from a renewable or recyclable resource.*

#### DESIGN JUSTIFICATION:

*By their shape, features, materials and details, roofs contribute significantly to the historic character of residential and multi-family buildings. Historic roof materials are usually related to the architectural age and style of the main building. Through variations in line, pitch and overhang, a historic roof can also reveal changes and additions to historic buildings over time. Chimneys, dormers and other roof features add to the diversity and character of historic buildings.*

#### SUSTAINABILITY JUSTIFICATION:

*Many aspects of sustainability should be considered when choosing a roof material, such as initial cost, lifetime cost, longevity or service life, reflectivity, energy savings, environmental impact of replacement, cost of manufacture and transportation, recycled content, ventilation, and thermal emittance of materials. Local weather extremes have resulted in the loss of most original roofing materials. Replacement materials should be appropriate to the style of the building and as long lasting as possible. Asphalt shingles are the most common choice for roofing across the country because of low initial cost.; however, they are petroleum based, not durable, require frequent replacement, and because they are not recyclable, they contribute significantly to landfill volume. As communities explore the potential of recycling asphalt shingles land fill impact may change.*

*Concrete and clay tiles require the most energy to manufacture. The weight of these products and natural slate, results in higher transportation costs. However, all three materials have very long life cycles, reducing their overall environmental impact. Fiber-cement composites include some amount of wood scrap or waste materials, reducing the amount of cement and concrete used. They are lighter weight than concrete tiles, reducing transportation energy requirements.*



*Roof color affects heat gain. Lighter colors reflect heat more effectively, increasing the energy efficiency of the home. Historically, white roofs were never applied for most dwellings and these would not be appropriate in the districts.*

**MAINTENANCE****ACTIONS THAT DO NOT REQUIRE REVIEW**

- 3.7.1: Preventative maintenance is the key to prevent roof damage. Inspect roofs regularly for normal wear and damage from storms or wind. Inspect flashing at roofing, gutters, and chimneys yearly. Repair leaks promptly in roofs to prevent wall and interior damage. Clean and repair gutters and downspouts to prevent water damage to fascia, soffits and walls.
- 3.7.2: Maintain roof and roof elements, thereby preserving the historic building.
- 3.7.3: Preserve the original shape, line, pitch and overhang of historic roofs, as well as architectural features such as dormers, chimneys and turrets.
- 3.7.4: Retain, preserve and keep in good repair distinctive features such as open eaves with exposed rafters and angled, decorative or plain rafter tails, flared eaves or decorative purlins, ridge cresting and brackets. Preserve flat roofs and parapets.
- 3.7.5: Integral gutters (those built-in to the edge of the roof, usually metal lined wood) should be maintained. Doing so will alleviate the need for new hanging gutters that may obscure roof edge details.
- 3.7.6: Flat roofs with parapets shall be preserved. Flat roofs not visible from the public right-of-way or concealed by parapets, may be replaced with membrane materials recommended for such applications.

*The original slate roof at 440 NW 14th Street can last indefinitely, eliminating replacement or waste issues. Also, they are fully recyclable in their existing form.*



*See also the section called "Features for Improving Energy Efficiency," in Chapter 4 for the placement of solar collectors.*

*Preserve original roof materials such as clay and cement tiles (2201 NW 28th Street).*

- 3.7.7: Repairs to flashing must be copper or other metal with a finish to match the roof color. Unfinished, galvanized metal flashing shall not be used.
- 3.7.8: Retain eave features such as exposed rafters and brackets.



*Preserve original related roof features such as rafter tails (left: 2612 N. Hudson), roof ridge tiles (center: 905 NW 38th Street), and brackets, also called knee braces (right: 1442 NW 37th Street).*

- 3.7.9: Replacement of non-historic composition roofing material with architectural grade composition shingles, regardless of color or pattern, is not subject to review and does not require a Certificate of Appropriateness (for repair, replacement, or installation of historic roofing materials, see Administrative Review).
- 3.7.10: Replacement in kind of existing, non-historic roof features such as gutters, downspouts, and turbines that meet the Guidelines for materials and location is not subject to review and does not require a Certificate of Appropriateness (for repair, replacement or installation of historic roof features, see Administrative Review).

#### **ADMINISTRATIVE REVIEW:**

##### **ACTIONS THAT REQUIRE REVIEW AND MAY BE ADMINISTRATIVELY APPROVED**

- 3.7.11: Historic roof materials shall be retained and preserved. If historic materials are deteriorated beyond repair, then replacement materials shall match the historic materials in all visual and compositional aspects except that architectural grade composition shingles may be used to replace wood shakes or wood shingles.
- 3.7.12: Decorative cut wood shingles shall only be installed in areas of the roof or exterior walls when consistent with physical or photographic evidence of having been used at the proposed locations on the building.
- 3.7.13: For ventilation of attic heat, roof vents should be located out of view on back sloping roofs. Vents are encouraged to help improve the energy efficiency of the building and may be more appropriately accommodated using compatible attic wall louvered vents. If the building roof does not have a back sloping roof and attic walls for ventilation louvers are not available, then side roof ventilation may be considered on the least visible side locations from the public right-of-way. Low-profile ridge vents may be used.

- 3.7.14: New roof features such as roof ventilators, antennas, satellite dishes and skylights may be installed, but must be located on back slopes and not visible from the public right-of-way. Solar panels and solar shingles may also be installed on back roof slopes as long as they are not visible from the public right-of-way.
- 3.7.15: Metal roofs were not widely used in Oklahoma City historic districts and their installation is not appropriate unless it can be historically documented at a given building. New metal roofs shall match the details of the historic metal roof they replace.
- 3.7.16: When large-scale replacement of roof materials other than asphalt shingles is required, historic fabric (such as slate, tile, metal shingles) that retains its integrity must be salvaged, and installed on prominent areas of the roof that are visible from the public right-of-way. Use of new, appropriate materials should be used on roof areas that are unobtrusive, and are less visible from the public right-of-way, for example back elevation locations.
- 3.7.17: New dormers, if needed to make attic space usable, must be located only on non-primary facades. It is not appropriate to locate new features on front or street-facing elevations such as on corner lots.

#### **Wood shingles**

- 3.7.18: Faux wood shingles (for example composition shingles) of a weathered wood color may be used to replace real wood shingles, if consistent with the original wood shingles in texture, dimensions, design, pattern and color and relative light reflectance. Modern wood shake roofing products do not match historic wood shingles and therefore are not permitted as replacements for wood shingles.
- 3.7.19: Replacing historic wood shingles with #1 cedar shingles is appropriate. When used, the surface texture should be smooth, sawn-cut rather than the linear texture resulting from the hand-split process typical of shakes.
- 3.7.20: Shingles should be laid in a horizontal row with the bottom edge either in alignment with the adjacent shingle or staggered to match the historic condition. Decorative cut wood shingles may be installed only in areas of the roof or walls where documentation indicates their historic presence.

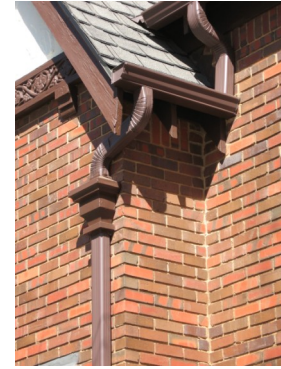
#### **Gutters, Downspouts and Flashings**

- 3.7.21: Flashing shall be copper or other metal finished to match the roof color. Unfinished galvanized metal flashing shall not be used.
- 3.7.22: Gutters and downspouts may be installed and shall be unfinished copper or painted or powder finished metal unless physical or photographic evidence demonstrates historical use of alternative materials or finish for the specific building.



*See information on rainwater harvesting in Chapter 2 for "Landscape and Landscape Elements" and "Plants and Planting Recommendations."*

*Appropriate copper gutter and downspout at 817 NW 40th Street, (left) and painted aluminum gutter and downspout at 235 NW 35th (right).*



- 3.7.23: Exposed galvanized metal or non-painted gutters and downspouts are not permitted.
- 3.7.24: New gutters shall be painted or powder finished to match the fascia color of the building unless copper is used. New downspouts shall be painted or powder finished to match the building or the building trim unless copper is used.
- 3.7.25: Copper gutters and down spouts may be installed when appropriate for the style of the building. Historical gutter shapes shall only be used when consistent with historical physical or photographic evidence of their use at the specific building.
- 3.7.26: The original shape, line, pitch and overhang of historic roofs are significant to the overall character of the building and must be retained.

***NO** - Elevating a roof to provide for additional living space would be a significant alteration to dwelling's original design and must be carefully considered.*



***YES** - Add additional living space through shed roof or gable dormers on back elevations not readily visible from the street.*

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### 3.8 FOUNDATIONS

#### POLICY:

*Visible foundation walls and decorative features may be character-defining and should be retained and preserved. Do not cover, conceal or obscure foundations.*

#### DESIGN JUSTIFICATION:

*The foundation ties the historic building to its site and foundation materials reflect building trends and help convey the architectural style and period of the building.*

#### SUSTAINABILITY JUSTIFICATION:

*Proper maintenance of historic foundations ensures that the embodied energy of an existing building is retained, eliminating the need for new resources and new energy to be used.*

#### MAINTENANCE:

##### ACTIONS THAT DO NOT REQUIRE REVIEW

- 3.8.1: The preservation and maintenance of foundations ensures the stability and preservation of a building.
- 3.8.2: Preserve the height, materials, features and details of a visible foundation wall including components such as vents and grilles, lattice skirting, and steps.



*Preserve original foundations such as brick (left: 406 NW 22nd Street) and stone (right: 411 NW 4th Street).*

- 3.8.3: Occasionally the foundation of a historic building may require adjustment by the installation of piers or jacks for leveling. If the result is no visible change to the exterior appearance of the historic building, then review is not required.
- 3.8.4: Downspouts, if present, should direct water away from foundations to prevent water and moisture damage.

**ADMINISTRATIVE REVIEW:****ACTIONS THAT REQUIRE REVIEW AND MAY BE ADMINISTRATIVELY APPROVED**

- 3.8.5: Skirting at residential buildings must be appropriate to the building style and age. Lattice that is “framed” may be an appropriate skirting material.
- 3.8.6: Foundations should be vented to control moisture underneath the building. Moisture encourages rot and attracts termites. Seasonally adjusted vents can help improve the overall energy efficiency of the building.



*Lattice is an appropriate addition between foundation piers (left: 610 NW 17th Street, right: 2612 N. Robinson Avenue).*

- 3.8.7: The design of new or replacement vents should be compatible with the age and style of the building.
- 3.8.8: Poor site drainage can result in moisture or water collecting under a building and having an adverse effect on the building foundation. Sites should be minimally regraded so water drains away from the building and does not pool near it.



*Downspouts should be located and designed to channel water away from the building (2205 NW 26th Street).*



### 3.9 ACCESSORY BUILDINGS INCLUDING GARAGES

#### POLICY:

*Accessory buildings in historic districts may include a wide variety of building types, such as secondary dwellings, carriage houses, garages, and sheds. Accessory buildings original to a property or added prior to the past forty years may have gained historic significance and should be preserved and maintained.*

#### DESIGN JUSTIFICATION:

*The primary materials used at historic garages structures were most often wood siding (either horizontal or vertical) or brick that matched the main house, with metal or wood shingle roofs. Some structures were higher style and matched stonework of the primary building. Accessory structures may have had gabled, hip, low sloping shed roofs or other roof styles. Traditionally, accessory buildings, especially garages, were important elements of a property and were often designed to be simpler, match and compliment the associated buildings.*

#### SUSTAINABILITY JUSTIFICATION:

*Like primary buildings, accessory buildings represent embodied energy. Continued use of an older or historic accessory building is a sustainable approach and reduces the need for new materials.*

#### MAINTENANCE:

##### ACTIONS THAT DO NOT REQUIRE REVIEW

- 3.9.1: Retain and preserve accessory buildings that contribute to the overall historic character of the primary building on the site and in the district including their components, materials, details, and features; thereby enhancing the historic character of a property and sustaining the embodied energy of such structures.
- 3.9.2: Repairs to an accessory building must be made with historic materials such as stone, brick, wood and other materials used on the original structure. Ordinary maintenance and repair, which does not require review, shall be less than 50% of a material, component, or feature on any one side of a structure.
- 3.9.3: Garage doors should typically be painted to match the color of the garage. In garages that are “high style”, it may be appropriate to use the color of the garage doors as a complementary or accent color to the overall color scheme. Ideally, color schemes should be verified (if possible) with historic photographs.
- 3.9.4: Garage door openers may be added to new or existing garage doors.
- 3.9.5: Pre-fabricated buildings (such as garden sheds) that are less than six feet in height may be located in back yards and may be located no closer than three feet to a side or back property line. Acceptable exterior materials include those listed in this chapter, “2.1 Maintenance, Preservation and Rehabilitation of Exterior Building Materials,” as well as plastic pre-fabricated panels. Metal siding is not acceptable for such buildings.



*Garages were often built with decorative detailing (left: 500 NW 14th Street), as well as with living quarters above (right: 2601 N. Hudson Avenue).*



**ADMINISTRATIVE REVIEW:****ACTIONS THAT REQUIRE REVIEW AND MAY BE ADMINISTRATIVELY APPROVED**

- 3.9.6: Locate ramps, railings or other accessibility-related installations on the back or side elevation of an accessory building and in an unobtrusive location. If locating a ramp on the primary facade of an accessory building is necessary, the ramp and railing must be installed in a way that does not damage the historic fabric and is as unobtrusive as possible.
- 3.9.7: Spacing and sizes of new window and door openings in a garage or other accessory building must be compatible with the existing accessory building and similar to their historic counterparts within the property, streetscape, or district, as must the proportion of window to wall space, without necessarily duplicating them.
- 3.9.8: Windows at accessory buildings, including those in pedestrian and vehicle doors, shall meet the requirements and recommendations of the section of this chapter for “Windows, Shutters, and Awnings.”
- 3.9.9: If it is necessary to replace the existing doors or other deteriorated or missing elements or details at a garage or other accessory structure, replace with a design based on accurate historical documentation. A new design that is compatible in style, form, scale, size, placement and finish with the primary structure or other historic garages and accessory buildings in the district may be used when no physical or photographic documentation exists otherwise.
- 3.9.10: In Heritage Hills Architectural and Historic District only solid wood vehicle garage doors with wood or concealed metal frames that match historical designs used in the district or compatible paneled designs are permitted.
- 3.9.11: In Heritage Hills Architectural and Historic District only solid wood garage pedestrian doors with wood frames that match historical designs used in the district or compatible paneled designs are permitted.
- 3.9.12: New garage pedestrian doors in all other districts may be solid wood with wood frames or alternate door and door frame materials such as composite wood or aluminum clad wood for locations that are not visible from the public right-of-way. Otherwise pedestrian doors and frames shall be solid wood.
- 3.9.13: New garage vehicle doors in all other districts may be solid wood, wood veneer with a concealed metal frame, or composite materials including fiberglass or wood fiber (85% minimum wood fiber content). Doors should first match the historic design. When the historic design is unknown then the doors should match the design of other historic garage doors used in the respective district. A paneled design may be appropriate.
- 3.9.14: New garage vehicle doors in Paseo Neighborhood Historic District may be smooth finished solid wood (without panels) unless another design is more historically appropriate for the property.
- 3.9.15: Metal garage vehicle doors with a paneled design are acceptable in the Heritage Hills East, Putnam Heights and Shepherd districts. These doors can be used at garages that are modest in style, located at the back of the lot, and minimally visible from the street or public right-of-way. Garage vehicle doors that are highly visible from a public street including the side street of a corner lot should not be metal.
- 3.9.16: Texture of replacement garage door material shall match the original or historic garage door texture or resemble smooth cut wood when the original garage door texture is not known.

- 3.9.17: When replacement of doors at an architecturally significant or ‘high style’ garage is necessary, new doors must match the design and material of the original or historic doors. When the original or historic door design is unknown, the new doors shall be compatible with the design and style of the garage or accessory building.

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### 3.10 SIGNS

**POLICY:**

*Signs must be in accordance with the City's overall sign ordinance, have good visibility and legibility, and of appropriate materials and design for the property and district for which they are proposed.*

**DESIGN JUSTIFICATION:**

*Permanent signs may not have been traditionally used in a particular district; therefore, new signs should be of limited size and made of appropriate materials for the property and district in which they occur. Placing signs in areas where they would not have been used historically may detract from the property and district.*

**SUSTAINABILITY JUSTIFICATION:**

*As with building elements, signs should adhere to principles of sustainability in their materials. The use of wood from managed forests is encouraged. As a petroleum based material (a non-renewable resource), plastic signs are neither allowed nor compatible with historic property and district materials.*

**ADMINISTRATIVE REVIEW:****ACTIONS THAT REQUIRE REVIEW AND MAY BE ADMINISTRATIVELY APPROVED**

- 3.10.1: Sign design and placement must comply with the City of Oklahoma City Sign Ordinance.
- 3.10.2: Signs shall not obscure historic building features such as cornices, gables, porches, balconies or other decorative, architectural building elements.
- 3.10.3: Signs placed on the exterior of buildings must be constructed of painted wood or metal.
- 3.10.4: Sign lighting may be incandescent bulbs on the sign or gooseneck front lighting fixtures appropriate to the style and age of the building. Use internal illumination for letters, not background.
- 3.10.5: Roof, off premise, flashing and plastic backlit signs may not be used unless documentation is available to demonstrate that such was used historically.
- 3.10.6: Use the building's architectural style and detail to enrich the meaning of a sign's content. Locate signs so that they relate to and do not compete with architectural features of the building.
- 3.10.7: Small scale neon signs may be used inside storefront windows; larger neon signs may be appropriate on buildings used for theatrical or entertainment purposes.
- 3.10.8: Small-scaled painted window signs are historically appropriate when they do not obscure views to merchandise and other window displays.
- 3.10.9: In general, signs must be small and limited to one per building including those with multiple commercial tenants. Content and design of a sign for such an instance must be coordinated.
- 3.10.10: Appropriately scaled and placed signs applied to a building or free-standing monument-style signs in front yard areas are appropriate sign types for multi-family properties and should minimize visual interference with the significant features of a property.

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### 3.11 LIGHTING

**POLICY:**

*Retain original or historic light fixtures whenever possible. If replacement is required, select appropriate styles, based on the architectural style of the building.*

**DESIGN JUSTIFICATION:**

*Original and historic light fixtures help convey a building's style and add to overall historic character.*

**SUSTAINABILITY JUSTIFICATION:**

*Preserving existing light fixtures preserves resources and will not require the use of new materials. Using long-lasting bulbs will make historic fixtures more energy efficient.*

**MAINTENANCE:**

**ACTIONS THAT DO NOT REQUIRE REVIEW**

- 3.11.1: Incandescent light bulbs have been the traditional means of lighting throughout the twentieth century. They are inexpensively manufactured, a savings passed on to the consumer. However, as new lighting options have become available, the incandescent bulb now represents the most energy-inefficient choice. By comparison, compact florescent lamps (CFL), while more expensive to manufacture, operate using far less energy, saving money over time. LED light bulbs are another choice for increased energy efficiency. Compared to CFLs, LEDs can be turned on and off frequently without effecting life span and also contain no mercury. There are a handful of states that currently prohibit the disposal of florescent bulbs with universal waste sent to landfills. Broken florescent bulbs are health hazards due to the release of mercury. Further, some studies have shown that CFLs begin to fade noticeably by half their rated lifetime. While LED bulbs are still far more costly than CFLs, they are considered the most promising lighting option in the future for reliability, efficiency, and longevity. In the meantime, CFLs appear to be the transitional lighting option.
- 3.11.2: The design and materials of lighting fixtures on buildings must be compatible with the historic character of the area and match the style and period of the building.
- 3.11.3: Refer to "Landscape Elements" in the Site and Landscape Considerations chapter in these Guidelines and Standards for site lighting.



*These light fixtures (left to right: 401 NW 14th Street, 505 NW 42nd Street, 911 NW 18th Street) are examples of designs that may be appropriate when choosing new light fixtures for a historic building.*

**MAINTENANCE:****ACTIONS THAT DO NOT REQUIRE REVIEW**

- 3.11.4: Historic light fixtures should be retained and maintained.
- 3.11.5: Regular maintenance and minor repair of original light fixtures is recommended.
- 3.11.6: The electrical components of historic fixtures may be replaced or modified to preserve the fixture and enhance its energy efficiency.
- 3.11.7: Deteriorated or damaged historic light fixtures should be repaired using methods that allow them to retain their historic appearance.

**ADMINISTRATIVE REVIEW:****ACTIONS THAT REQUIRE REVIEW AND MAY BE ADMINISTRATIVELY APPROVED**

- 3.11.8: Replace missing or severely damaged historic light fixtures with fixtures that replicate the original or other appropriate fixtures that closely match the appearance and materials of the original.
- 3.11.9: If a compatible replacement fixture cannot be located, then a modern design with modest detailing that is compatible with the architecture of the building may be used.
- 3.11.10: If new light fixtures are needed where they previously did not exist, the new fixtures should be unobtrusive, conceal the light source and direct light toward the building.



## ***Preservation Standards and Guidelines:***

### **4. NEW CONSTRUCTION: Stand-Alone New Construction and Additions to Existing Buildings**

#### **4.1 GENERAL REQUIREMENTS FOR NEW CONSTRUCTION AND ADDITIONS**

##### **POLICY:**

*New construction and additions should not destroy historic materials or general features that characterize a historic building, property or district. New work should be differentiated from existing, historic structures and protect the historic integrity of the property and the historic district. Additions to historic structures should be done so that the historic character of the structure is retained and, if removed in the future, the essential form and integrity of the original structure and site would be unimpaired.*

##### **DESIGN JUSTIFICATION:**

*New construction and its integration with an existing building, property or district should be compatible with surrounding existing historic architecture. Compatibility may include the size, shape, massing and materials of new construction. The relationship of new construction form to the historic context in which it is located is critical for maintaining visual character of a historic building, property or district.*

##### **SUSTAINABILITY JUSTIFICATION:**

*Effective resource conservation includes consideration of the renewability of resources, the manufacturing processes used to create the materials and the recycled construction materials, energy costs associated in the manufacture and shipping of construction materials, and the ways selected materials*

##### **COMMISSION REVIEW:**

##### **ACTIONS THAT REQUIRE REVIEW BY THE HPC**

- 4.1.1: Over the next decade it is expected that 25% of new commercial and institutional buildings and 20% of new residences will qualify as "green." Green buildings may be certified under the Leadership in Energy and Environmental Design (LEED) program, a trademarked system under which buildings are awarded points in five categories: 1) sustainable sites, 2) water efficiency, 3) energy and atmosphere, 4) indoor environmental quality, and 5) innovation and design process.
- 4.1.2: New construction, which may include a new, stand-alone primary or accessory building, a new garage, an addition to an existing building or a substantial renovation to an existing building, should be designed to take the five LEED categories into consideration.

- 4.1.3: Significant alteration of the topography of a property through extensive grading, removal or alteration of rolled terraces and similar character-defining features, filling or excavating, is not permitted.
- 4.1.4: Refer to Chapter 3, “Alterations to Building Fabric and Components of Historic Building,” for items, components, features or materials planned for new construction or additions that may not be addressed by this Chapter.

## 4.2 STAND-ALONE NEW CONSTRUCTION

### POLICY:

*New stand-alone construction should complement and not detract from the overall historic character of the historic property or district.*

### DESIGN JUSTIFICATION:

*The way in which existing and new buildings relate is important in maintaining the overall historic character of a historic property and district. Architectural design directly affects the integrity of the property and district as a whole. For this reason, new, stand-alone buildings should maintain the continuity of the character of a historic property and district.*

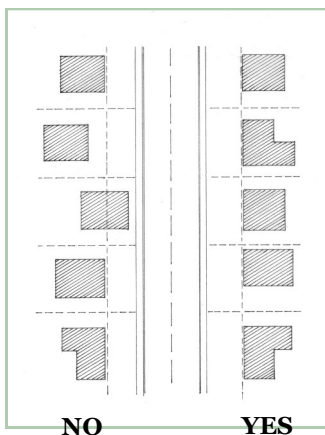
### SUSTAINABILITY JUSTIFICATION:

*New construction should adhere to principles of sustainability in design, materials, and energy efficiency.*

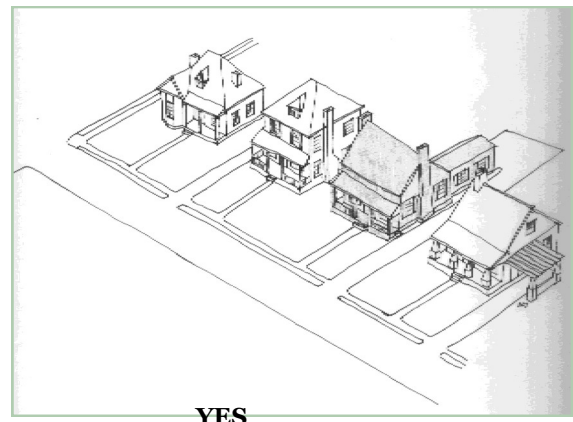
### COMMISSION REVIEW:

#### ACTIONS THAT REQUIRE REVIEW BY THE HPC

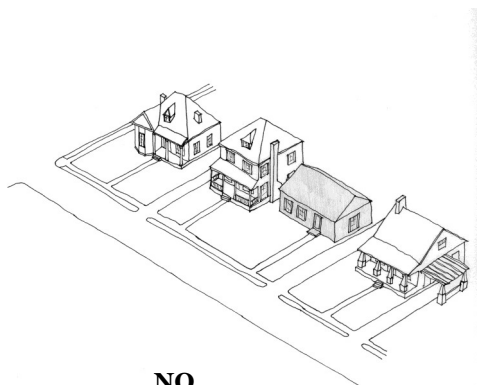
- 4.2.1: New buildings must follow historic setback patterns of the street.



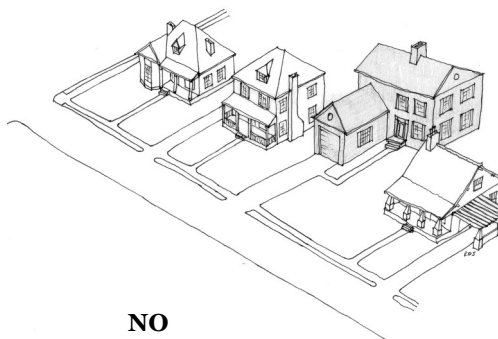
*(Left) inappropriate setbacks on the left side of the street contrast with uniform setbacks on the right side. (Right) appropriate setback of new construction (shaded).*



- 4.2.2: New stand-alone and infill buildings should be consistent with historical patterns of development for the property, block and district.
- 4.2.3: Construction of stand-alone and infill buildings should be compatible in size, scale, proportion, spacing, texture, setbacks, height, materials, color and detail to adjacent or nearby buildings and streetscapes.
- 4.2.4: New buildings must fill the same proportion of lot area as other buildings on the streetscape. The pattern created by spaces between buildings should be continued.



NO



NO

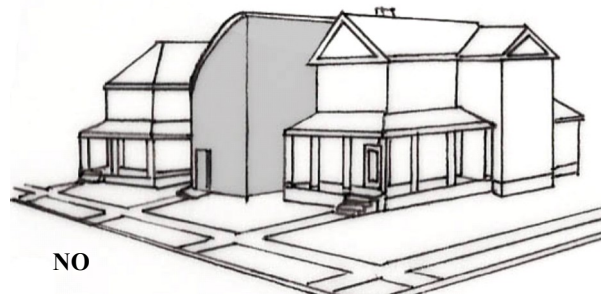
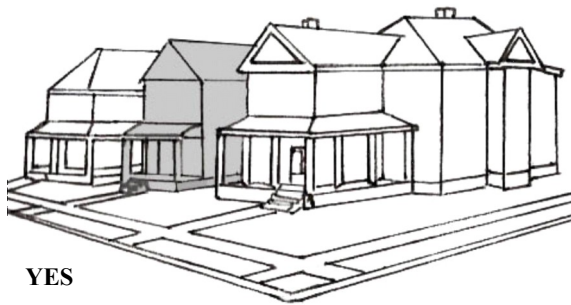
*Examples of inappropriate new infill buildings that are not consistent with the massing, size, proportion and scale of the nearby historic multi-storied, square-plan dwellings with full-width front porches.*



*Vacant lots such as at 600 26th Street (left) and 100 NW 31st Street (right) provide opportunities for compatible new construction.*

- 4.2.5: New construction must respect the architectural integrity and context of surrounding buildings. Existing adjacent historic structures and streetscapes should be taken into consideration before designing new construction. Incorporating existing architectural features with new design elements can add interest and enhance the compatibility of the new building in the district or other new infill buildings on a property.
- 4.2.6: The height of new buildings should relate to the heights, roof-forms and cornice lines of adjacent structures and to those of other buildings on the streetscape. The height of new buildings should conform to the following unless historical development patterns are documented otherwise:
  - 4.2.6.1: In streetscapes with uniform building heights, new buildings should match this height. For example, on a streetscape of all one-story residential structures, any new building should also be one story in height.
  - 4.2.6.2: In streetscapes with varied building heights, the height of new buildings should align with the existing buildings on the streetscape, with particular attention paid to the predominant height of the adjacent structures and other structures on the streetscape.

- 4.2.6.3: The floor-to-floor heights of new buildings should closely align with the floor-to-floor heights of the adjacent or nearby historic structures.
- 4.2.6.4: The height of porches of new buildings should closely align with the porch heights of the historic buildings on the same streetscape, with particular attention paid to porch heights of adjacent structures.
- 4.2.7: The design of new construction should be compatible with historic styles within the district yet not imitate them so as to provide distinction between the historic buildings and new construction.



*New construction should be consistent with the predominate shapes and roof forms on the block.*

- 4.2.8: In new construction, the use of materials similar to those of the adjacent historic structures is encouraged. Actual replication of these materials is not encouraged. This approach ensures the design compatibility of the historic structures while clearly differentiating between old and new.
- 4.2.9: Similar shapes that are repeated in many buildings within a streetscape are encouraged to be incorporated in the design of a new residential building. Replication of historic detailing is discouraged; however, the repetition of similar shapes and elements can help provide continuity and enhance compatibility between new and old structures.
- 4.2.10: Spacing and size of window and door openings must be similar to their historic counterparts within the streetscape or district, or be typical of structures of the same type, age and location. The proportion of window to wall space should also be similar to their historic counterparts, without duplicating them.
- 4.2.11: Ramps or other accessibility-related installations should be located on the back or side elevation of the new construction and in as unobtrusive a location as possible. If locating a ramp on the primary facade is required, it should be installed in a way that is as unobtrusive as possible and blends with the adjacent historic properties.
- 4.2.12: Only when a previously demolished historic building can be accurately replicated may a reproduction be considered at that site.
- 4.2.13: Facades of new construction facing an alley may be simplified and secondary in design to that of primary facades. The same materials should be used for alley facing building elevations as those of the primary facade, unless this varies from the typical historic condition within the district.

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### 4.3 BUILDING ADDITIONS

#### POLICY:

*Additions should complement and not detract from the overall historic character of the historic district.*

#### DESIGN JUSTIFICATION:

*The way in which a historic building and an addition to it relate is important in protecting the integrity of the historic property and district. An addition directly affects the integrity of the building as a whole. Building additions should not detract from the historic character of the historic building or district.*

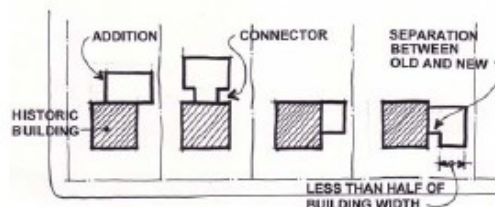
#### SUSTAINABILITY JUSTIFICATION:

*New construction should adhere to principles of sustainability in their materials, design and energy efficiency. If construction of additions results in the removal of original fabric, consideration should be given to maximizing the retention or re-use of existing historic features, details and materials.*

#### COMMISSION REVIEW:

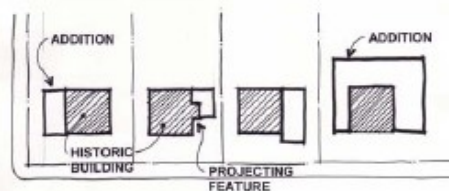
##### ACTIONS THAT REQUIRE REVIEW BY THE HPC

- 4.3.1: Additions must be compatible in design, proportion, size, texture, color, and detail to adjacent buildings and streetscapes, and should be appropriate to the architectural style of the existing building. The incorporation of existing architectural features with new design elements can contribute added interest and compatibility.
- 4.3.2: New additions must be planned so that they are constructed to the back of the property or on a non-character-defining elevation preferably not visible from the public right-of-way. Character-defining features of buildings should not be radically changed, obscured, damaged or destroyed by an addition. The existing historic building fabric should not be damaged by the installation of a new addition.



ACCEPTABLE LOCATIONS FOR ADDITIONS

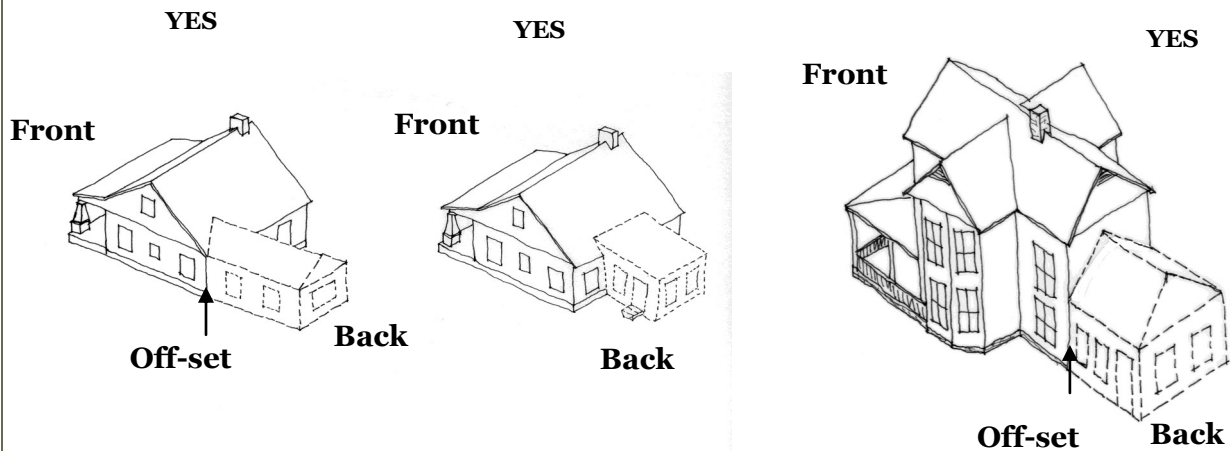
YES



UNACCEPTABLE LOCATIONS FOR ADDITIONS

NO

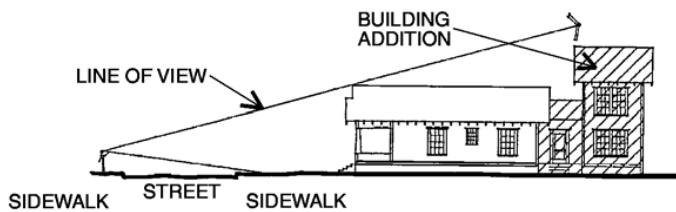
- 4.3.3: It is not appropriate to alter the overall character of historic districts by substantially reducing the ratio of open space to built space on any site through new construction, additions or introduction of surface paving or other hardscape feature.
- 4.3.4: New additions shall not exceed 50% of the square footage of the footprint of the existing historic structure (enclosed space only), or 750 square feet, whichever is larger, and shall be no taller, no wider, and no deeper than the existing historic structure.
- 4.3.5: Additions to historic or non-historic buildings should relate to and complement the style of the main building, and may relate to the general style of the streetscape.



*Additions should be complementary in size and scale to the original building and be located on back elevations.*

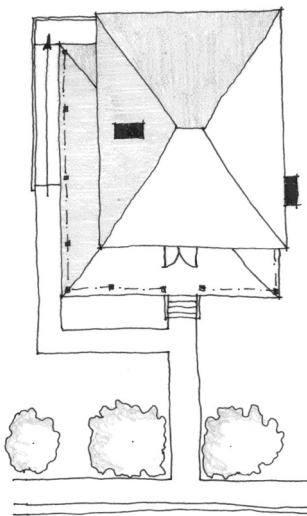
- 4.3.6: An addition to a historic building must be designed to be visibly distinguishable from the original historic building.
- 4.3.7: Additions to historic buildings should be designed so that connections between new construction and historic structures are clearly discernible. A clear definition of the transition between the new addition and the historic structure should be established and maintained.
- 4.3.8: An addition may be differentiated from the historic building by connecting the two with a modest connector, designed to be as transparent and unobtrusive as possible.
- 4.3.9: Historic details in the coping, eaves and parapet of the historic building may be continued at the point where the historic structure connects to the addition.
- 4.3.10: Additions should be clearly secondary to and distinct from the original building. This can be accomplished by providing a clear visual break between the historic building and the addition, by setting the façade of the addition back from that of the historic building, or by constructing a recessed area at the point at which the addition and the historic building join together.
- 4.3.11: Use of different but compatible materials or different (simplified) detailing is also appropriate to differentiate a new addition from the historic building.





*An appropriate vertical addition to a building will not be visible to a person standing across the street. Vertical additions are not permitted on corner locations nor in the Mesta Park Historic District.*

- 4.3.12: The design of a new addition must consider and respect the massing, roof shape, bay spacing, cornice lines and materials of the building to which it is being added.
- 4.3.13: An addition may be horizontal (added to a side or back elevation) or vertical (a second story added to an existing one-story). However, vertical additions are not permitted at corner lots, nor in the Mesa Park Historic District. While vertical additions are not prohibited in other districts and internal lots, it is rare that the other requirements and recommendations of this section can be met.
- 4.3.14: Vertical additions to buildings must be located so that they are not visible to a person standing at ground level on the opposite side of an adjacent right-of-way. A vertical addition is not permitted at a corner lot because such an addition would be visible from the side street.
- 4.3.15: Facades of additions facing an alley or rear property line may be simplified and secondary in design to that of facades that are more visible from adjacent properties or the streetscape public right-of-way. The same materials should be used for alley-facing facades as that of the other facades unless this varies from the typical historic condition within the district.
- 4.3.16: Ramps or other accessibility-related installations should be unobtrusive and located on the back or side elevations. If a ramp is required to be on the primary or highly visible façade of a building or addition, it should be designed to be as unobtrusive as possible.



*Wheelchair and access ramps should be located at back or side elevations, not on primary facades (left) and should be of compatible design and materials with an existing porch or other features of the historic building (right).*

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## 4.4 GARAGES

### POLICY:

*The retention of existing, historic garages is encouraged. A historic garage should be refurbished and modified instead of demolished or replaced to accommodate contemporary lifestyle requirements. New garages are permitted where a house does not have a garage or where a new garage is necessary. As with other accessory buildings, garages should have their own form and should generally appear as secondary structures and not visually overwhelm or compete with the other historic buildings of the property or district.*

### DESIGN JUSTIFICATION:

*The way in which a new garage relates to other historic buildings of a property is important in historic districts. A new garage directly affects the integrity of the property as a whole. For this reason, a new garage should not detract from the historic character of the property.*

### SUSTAINABILITY JUSTIFICATION:

*New garage construction should adhere to principles of sustainability in materials, design, and energy efficiency.*

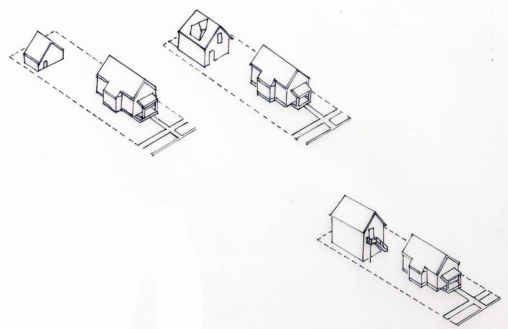
### **REVIEW NOT REQUIRED**

- 4.4.1: Garage doors should typically be painted to match the color of the garage. For garages that are “high style” it may be appropriate to use the color of the garage doors as a complementary or accent color to the building color scheme.
- 4.4.2: Electronic garage door openers may be installed and used.

### **COMMISSION REVIEW:**

#### ACTIONS THAT REQUIRE REVIEW BY THE HPC

- 4.4.3: Construction of a new or replacement garage should follow the historic setback for a garage on the property or setback patterns of other garages in the streetscape or historic district.
- 4.4.4: Historic garages in Oklahoma City’s historic districts are predominantly detached, and attached garages are not appropriate unless documentation demonstrates their previous historic existence at the property.
- 4.4.5: Construction of a replacement garage shall approximate the original configuration, form, massing, style, placement and detail of the former garage as described by photographic or other documentation.



*In conjunction with the historical development of a property, some possible locations and designs for new garages are depicted.*

- 4.4.6: Construction of a replacement garage may reasonably expand beyond the footprint of a historic one- or two- car garage, up to a total footprint of 450 square feet or 5% of the lot, whichever is greater, in order to accommodate a standard size parking space for up to two vehicles. Additional factors including the level of visibility of a new garage and the size and massing of surrounding structures may be considered.
- 4.4.7: Design a new garage to be secondary to that of a property's main historic building.
- 4.4.8: When no photographic or other documentation of a previous garage is available, a new garage should be compatible in size, scale, proportion, spacing, texture, setbacks, height, materials, color and detail to the primary building and should relate to similar garages within the historic district, as appropriate.
- 4.4.9: Materials used for a new garage should reflect the property's historical development and the use and function of the garage. Materials used for the exterior facades of a garage were often different (and less costly) than those used for the primary building.
- 4.4.10: A garage may be of 'modest' or 'high-style' design to complement a property's historical development. Often, a new garage should be modest with a simple rectangular plan and form and a low-pitched, gabled or hipped roof. Doors and windows may have little or no ornamentation.
- 4.4.11: When no photographic or other documentation is available, A new one-story garage should be similar in height to other similar, historic one-story garages in the streetscape and historic district. A new two-story garage should be similar in height to the historic two-story garages of adjacent properties, in the streetscape and of the historic district.
- 4.4.12: When no photographic or other documentation of a previous historic garage is available, a replacement garage may be two-stories tall when the original or historic garage was two-stories, or if located in a block where two-story or one and a half story garages are dominant or occur on abutting property. New garages in blocks that contain only one-story garages shall be one-story.
- 4.4.13: In locations where two-story garages are not allowed, a garage may be one and a half stories as defined in the Municipal Code so long as its design and height approximate the massing of a previous historic garage at the property, or adjacent one-story garages if no documentation of a previous historic garage is available.

#### **Garage Doors, Openings, and Doors**

- 4.4.14: Spacing and size of window and door openings in a new garage should be consistent with the historical development of the property and similar to their historic counterparts within the streetscape or historic district, as should the proportion of window to wall space.
- 4.4.15: In Heritage Hills Architectural and Historic District only solid wood pedestrian and vehicle garage doors with wood or concealed metal frames that match historical designs used in the district or compatible paneled designs are permitted.
- 4.4.16: In Heritage Hills Architectural and Historic District only solid wood garage pedestrian doors with wood frames that match historical designs used in the district or compatible paneled designs are permitted.
- 4.4.17: New garage pedestrian doors in all other districts may be solid wood with wood frames or alternate door and door frame materials such as composite wood or aluminum clad wood for locations that are not visible from the public right-of-way. Otherwise pedestrian doors and frames shall be solid wood.

- 4.4.18: New garage vehicle doors in all other districts may be solid wood, wood veneer with a concealed metal frame, or composite materials including fiberglass or wood fiber (85% minimum wood fiber content). Doors should first match the historic design. When the historic design is unknown then the doors should match the design of other historic garage doors used in the respective district. A paneled design may be appropriate.
- 4.4.19: New garage vehicle doors in Paseo Neighborhood Historic District may be smooth finished solid wood (without panels) unless another design is more historically appropriate for the property.
- 4.4.20: Metal garage vehicle doors with a paneled design are acceptable in the Heritage Hills East, Putnam Heights, and Shepherd districts. These doors can be used at garages that are modest in style, located at the back of the lot, and minimally visible from the street or public right-of-way. Garage vehicle doors that are highly visible from a public street including the side street of a corner lot should not be metal.
- 4.4.21: At double garages, two single garage vehicle doors should be used instead of one larger, double door. This will maintain the scale and rhythm of older structures, making a two-car garage seem smaller and more compatible with the primary building and the district.
- 4.4.22: If a historic garage is to be demolished to allow the construction of a new garage, it is encouraged that the historic doors be salvaged and re-used at the new garage, or if this is not possible, that the historic garage doors be replicated in the new garage design.
- 4.4.23: Doors at new high style garages should complement the garage in design and materials. The use of paneled wood garage doors or custom garage doors is encouraged at these locations.

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## 4.5 ACCESSORY BUILDINGS

### POLICY:

*Accessory buildings could have been very modest, simple rectangular buildings such as barns, garages or outbuildings with one large opening for an overhead or sliding garage door or more ornate children's playhouse, workshops or carriage houses with materials and details that matched the main building. Garages are addressed separately in the preceding section within this chapter.*

*The retention of existing, accessory buildings is encouraged. Refurbishment and modifications to historic accessory buildings is preferred to demolition and replacement. New accessory buildings are permitted where necessary, and they should have their own form. However, they should appear as secondary structures and not visually overwhelm or compete with the property's other historic buildings.*

### DESIGN JUSTIFICATION:

*The way in which new accessory buildings relate to other historic buildings of a property is important in historic districts. A new accessory building directly affects the integrity of the property as a whole. Therefore, a new accessory building should not detract from the historic character of the property.*

### SUSTAINABILITY JUSTIFICATION:

*New accessory building design and construction should adhere to principles of sustainability in materials, design, and energy efficiency.*

### **REVIEW NOT REQUIRED**

- 4.5.1: Pre-fabricated storage units, such as garden sheds, less than six feet in height may be located in back yards.
- 4.5.2: Pre-fabricated units must have a minimum three foot setback from side or back property lines.
- 4.5.3: Acceptable exterior materials for pre-fabricated units include those listed in the "Exterior Materials at New Construction" section of this chapter.
- 4.5.4: Plastic pre-fabricated storage units may be used. Metal sided units are not acceptable for such buildings.

### **ADMINISTRATIVE REVIEW:**

#### ACTIONS THAT REQUIRE REVIEW AND MAY BE ADMINISTRATIVELY APPROVED

- 4.5.5: The appearance and location of a new accessory building should be based on the appearance of the historic accessory building if such existed. Use historic photographs and other documentation such as Sanborn Fire Insurance maps for guidance as to size and location of a previous accessory building on the property.
- 4.5.6: If documentation of a historical accessory building at the site is not available, the size, design and location of a new accessory building should be in keeping with other accessory buildings in the block and historic district.

- 4.5.7: Accessory buildings should be located in the back yard.
- 4.5.8: Design of new accessory buildings shall be secondary to that of the main historic building and should be secondary to the design of the property's historic garage.
- 4.5.9: Accessory buildings more than six feet tall should be compatible in size, scale, proportion, spacing, texture, setbacks, height, materials, color and detail to the main residential building. Additionally, new accessory buildings may relate to similar accessory buildings within the historic district.
- 4.5.10: Materials used at accessory buildings should reflect the use and function of the accessory building, and not necessarily that of the primary building. Materials used at exterior facades of accessory buildings were often different (simpler and less costly) than material used for the main building.
- 4.5.11: New accessory buildings shall follow the historic side and back yard setback patterns of other accessory buildings on the property, in the block or in the historic district.
- 4.5.12: Spacing and size of window and door openings should be similar to their historic counterparts within the block or historic district, as should the proportion of window to wall space.
- 4.5.13: Ramps or other accessibility-related construction should be installed in a way that does not damage the historic fabric of other historic buildings and should be designed and located to be as unobtrusive as possible.
- 4.5.14: If mechanical equipment, skylights or solar panels are placed on the roof of an accessory building, they should be set back or screened so that they are not visible to a person standing at ground level on the opposite side of an adjacent street or public right-of-way.



## 4.6 EXTERIOR MATERIALS AT NEW CONSTRUCTION

### POLICY:

*Materials used in the construction of new buildings, additions, garages and other accessory buildings should be compatible in appearance and design with common building materials in the district, or typical of structures of the proposed style, type, age and location.*

### DESIGN JUSTIFICATION:

*The form, materials and details of exterior walls and embellishments, as well as their scale, texture and variety, contribute to the overall character of the historic district.*

### SUSTAINABILITY JUSTIFICATION:

*Materials for new exterior wall construction should be as sustainable as possible. Appropriate siding materials may include stucco, wood, brick, or cementitious siding. Vinyl and metal siding materials are not sustainable and should not be used.*

### **ADMINISTRATIVE REVIEW:**

#### ACTIONS THAT REQUIRE REVIEW AND MAY BE ADMINISTRATIVELY APPROVED

- 4.6.1: Alterations to existing, non-historic buildings (see “Alterations to Building Fabric and Components of Historic Buildings,” 3.1.10) that meet the criteria in this section may be administratively approved.

### **COMMISSION REVIEW:**

#### ACTIONS THAT REQUIRE REVIEW BY THE HPC

#### **Wall Materials**

- 4.6.2: Materials for new construction should be consistent with those at other buildings within the property, block and historic district. Consideration should be given to the pattern of development of the specific property and lot.

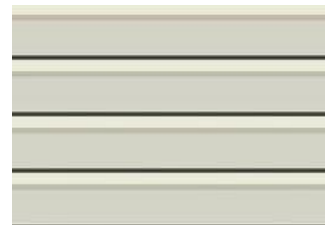


*Vinyl siding is easily damaged and cannot be*

- 4.6.3: Wood siding may be tongue and groove, shiplap, novelty or other compatible type. Board and batten may also be appropriate for use on accessory buildings; it is rarely used on primary buildings.
- 4.6.4: Brick is a common material in Oklahoma City historic districts and is appropriate for use on new construction.
- 4.6.5: Stone, particularly the earth-colored sandstone found in many of the historic districts, in an appropriate material that can be incorporated into new construction.
- 4.6.6: Cementitious siding (smooth finish) of an appropriate profile may be used at new construction of stand-alone primary buildings, garages and other accessory buildings. It may also be used for additions to historic structures.
- 4.6.7: Exterior insulation finish systems (also known as EIFS or Dryvit), metal and vinyl siding, concrete block, imitative brick or stone or gravel aggregate materials are not permitted as wall materials. However, ornamental, rock-faced, mold-formed or rusticated concrete block may be used for foundation walls if previously used for other buildings on the property or in the district.
- 4.6.8: Stone patterns, sizes and color of individual stones should be similar to those found at the property or in historic buildings in the historic district and typical of structures of the same style, type, age and location.
- 4.6.9: Masonry bonding patterns, sizes and color should be similar to those found at the property or used for historic buildings in the historic district and typical of structures of the same style, type, age and location.



*Cementitious siding in a smooth finish (left) is an appropriate and sustainable choice for new construction, unlike vinyl or metal siding (right).*



### Windows

- 4.6.10: Windows in additions to existing buildings must match or complement the proportion, shape, pattern, size, details and profile of the windows in the historic building. If the historic or existing windows are wood, the windows of the addition may be wood, vinyl-clad wood or aluminum-clad wood. If the historic windows or existing are steel, the windows of the addition should be steel or other compatible metal. All windows in new additions should be of a profile similar to the windows in the historic building.



*Windows for new construction should be of wood (left) or aluminum clad wood with baked enamel finishes (right).*



- 4.6.11: Windows in new stand-alone construction must be similar to their counterparts within the property, block or historic district. These windows may be wood, vinyl clad wood, metal clad wood, or metal with a profile similar to the windows of other buildings on the property. For new infill construction the profile must be similar to the windows used on other properties in the block or historic district.
- 4.6.12: New windows may have a simpler window pane pattern than their historic counterparts; for example, if the historic windows are 6/1 (read “six over one”), then 1/1 windows of the same overall size may be used.
- 4.6.13: Windows constructed entirely of aluminum or vinyl are not permitted, and aluminum surfaces cannot have a clear, mill or anodized finish unless supported by historic documentation for a specific property or structure.
- 4.6.14: Clear glass must be used in all windows. Reflective, tinted, patterned or sandblasted glass in windows is generally not appropriate. Patterned, leaded or colored glass can be used in transoms and sidelights when established by the architectural style of the building or when supported by historical documentation for a specific property or structure.
- 4.6.15: Thermal pane (also known as insulated glass) windows are acceptable for additions or new construction. When muntins are proposed for a divided light appearance they should be “true divided lights” meaning that the thin wood framing (called ‘muntins’) completely frames and separates each piece of glass from the others.
- 4.6.16: Simulated muntins sandwiched between layers of glass in thermal windows, snap-on muntins, and surface-applied muntins may not be used except when internal muntins are used in conjunction with permanently fixed surface-applied muntins on the interior and the exterior of the glass.

- 4.6.17: Security bars may be used only on the interior side of windows and not sandwiched in between the layers of insulated glass.
- 4.6.18: Storm windows and window screens are permitted and should meet the recommendations and requirements of the applicable sections in the “Alterations to the Building Fabric and Components of Historic Buildings” chapter.

#### **Doors**

- 4.6.19: Recommendations and requirements for garage type doors are described in the “Garage” section of this chapter.
- 4.6.20: Recommendations and requirements for primary entrance doors, screen doors and storm doors, and doors that are visible from the public right-of-way are the same as described for the “Alterations to the Building Fabric and Components of Historic Buildings” chapter.
- 4.6.21: Swinging (French) or sliding patio doors used for new construction in the back of a new infill primary building, or new garages, accessory buildings, or new additions in the back yard and used in conjunction with sidelights may use the recommendations and requirements associated with the previous subsection of this section, “**Windows**,” provided that the patio doors and sidelights will match.
- 4.6.22: Pedestrian doors that are not visible from the public right-of-way may be made of alternate materials including aluminum clad wood, composite wood, and fiberglass. Doors in Heritage Hills must be of solid wood.

#### **Roof and Roofing Materials**

- 4.6.23: Wood shingles, composition shingles, slate tiles, terra cotta or clay tiles are permitted for use on roofs. Recommendations and requirements for these materials are found in the “Alterations to the Building Fabric and Components of Historic Buildings” chapter.
- 4.6.24: Metal roofs are permitted only as supported by historical documentation of such material for the property.
- 4.6.25: Synthetic slate and clay tiles may be able to be used if the appearance matches authentic slate and clay tiles in all aspects. These materials may be considered on a case by case basis.
- 4.6.26: Composition roofs should be of higher quality and are often referred to as Architectural Grade or Dimensional Grade. These shingles are usually rated as 30-, 40-, or 50-year shingles and have a thicker profile.
- 4.6.27: Built-up roofs, single-ply membranes should not be used on sloped roofs.
- 4.6.28: Multi-colored asphalt shingles and synthetic wood shingles should not be used on sloped roofs.
- 4.6.29: Historic eaves, copings, cornices, dormers and roof trim should be retained and preserved.

## 4.7 FEATURES FOR IMPROVING ENERGY EFFICIENCY IN NEW CONSTRUCTION

### POLICY:

*The installation of new features to improve energy efficiency is appropriate as long as they do not detract from the historical appearance of the property or district.*

### JUSTIFICATION - DESIGN:

*Contemporary or new energy and energy saving features should be placed out of public view and not detract from the historic character of a building or district.*

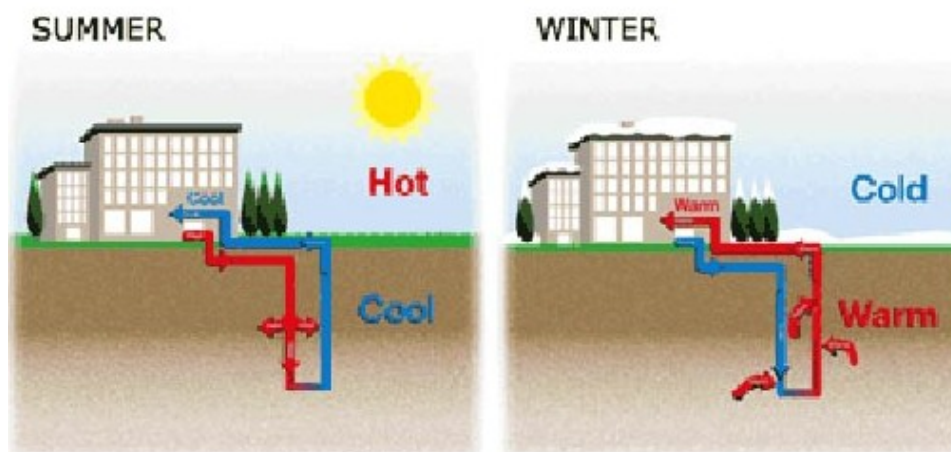
### JUSTIFICATION - SUSTAINABILITY:

*The practical applications of alternative energy methods continues to progress and the cost-benefit ratios of applying this technology to older buildings is expected to become more attractive in coming years. The installation of alternative energy sources, where practical and economical, is encouraged to conserve energy and aid sustainability efforts.*

### REVIEW NOT REQUIRED

#### Geothermal and ground source heat pumps

- 4.7.1: Geothermal heat pumps, also known as ground-source heat pumps, uses the earth's constant temperature, rather than outdoor air, as an exchange medium.
- 4.7.2: Geothermal heating and cooling systems can save 20-70% of energy costs, depending on the season. Installation of such a system, involving drilling of holes in the ground, does not affect the exterior of a building and offers significant energy savings.
- 4.7.3: For geothermal equipment visible above grade, reference the same recommendations and requirements for mechanical equipment in the "Site and Landscape Considerations" chapter.



*Geothermal systems use the constant temperature of the earth to exchange hot and cold air.*



*Appropriately placed solar panels (left) and solar shingles (right) at back roof lines.*



### **ADMINISTRATIVE REVIEW:**

#### ACTIONS THAT REQUIRE REVIEW AND MAY BE ADMINISTRATIVELY APPROVED

- 4.7.4: Solar panels and solar shingles must be installed on back facing roof slopes and lay flat on the roof slope. They must not be visible from the public right-of-way or from streets including side streets for corner or interior lots.
- 4.7.5: Southern exposures receive sunlight during the entire day, making them the ideal location for solar panels or shingles. However, solar panels and shingles are not permitted for the front (south) roof slope of south-facing buildings. Solar panels and solar shingles are better suited for north-facing buildings whose south-facing roof slope is only visible from the back yard.
- 4.7.6: Solar panels for south-facing buildings are encouraged as free-standing solar panels installed in a back yard and out of public view.
- 4.7.7: Solar panels may be installed in back yards, as long as the height of the panel and the mounting system combined is less than six feet tall and they are not visible from the public right-of-way and adjacent properties.



*Left: an appropriate location for solar panels, out of public view and screened in a back yard; right: solar panels should not be sited on roof-lines that are visible from the public right-of-way.*



### **COMMISSION REVIEW:**

#### ACTIONS THAT REQUIRE REVIEW BY THE HPC

##### **Wind turbines**

- 4.7.8: Wind turbines require open space to harness energy from moving air which usually means that equipment needs to be installed at a height taller than any other structures or trees. This energy generation method will likely not prove practical in urban historic districts and is not permitted.
- 4.7.9: The Historic Preservation Commission may reconsider permitting wind turbines if sufficient advances are made in the technology to ensure compatibility with historic buildings and districts, for example, by meeting the requirements for landscape elements in back yards (not visible from the public right-of way or neighboring properties and less than six feet tall).

## APPENDIX A

### DEFINITIONS

The following terms are used throughout these Standards and Guidelines. Some of these terms are also found in the Oklahoma City Municipal Code, 2010, Chapter 59—Zoning and Planning Code, Article II.

**ABUTTING:** Having a common border with, or being separated from such common border by an alley or easement. This term implies closer proximity than the term “Adjacent.”

**ACCESSORY BUILDING** means a subordinate building or a portion of the main building, the use of which is located on the same lot and is incidental to the dominant use of the main building or premises.

**ADDITION or EXPANSION** means an increase in floor area of a building, or a modification to the roof line of a building, such as the construction of a dormer, that increases the amount of floor space devoted to human use or occupancy.

**ALLEY** means a public right-of-way that normally affords a secondary means of access to abutting property.

**ALTERATION** means any change in size, shape, character, occupancy or use of a building or structure.

**Major Alteration** means an alteration, which affects the historic, cultural, or architectural integrity, interpretability, or character of a building, structure, site or district. Generally includes the kind of work which is normally done with the aid of a professional drafter or professional quality plans.

**Minor alteration** means an alteration, which does not significantly affect the historic, cultural, or architectural integrity, interpretability, or character of a building, structure, site or district. Generally includes the kind of work, which is normally done without the aid of a professional drafter or professional quality plans.

**APPROPRIATE** means typical of the historic architectural style, compatible with the character of the historic district, and consistent with these preservation criteria.

**ARCHITECTURAL SHINGLES** means composition asphalt roof shingles that are heavier weight and are irregularly sized that resemble the random textured look of wood shingles.

**ARCHITECTURAL STYLE** means a category of architecture of similar buildings distinguished by similar characteristics of construction, design, materials, etc. Typical styles in Oklahoma City include Vernacular, Classical Revival, Craftsman, Queen Anne and Mission.

**AWNING** means a fixed shelter of any material, and of any length, not supported by a column or posts from the ground and attached to a building.

**BALCONY** means a platform that projects from the exterior wall of a building above the ground floor, which is exposed to the open air, has direct access to the interior of the building, and is not supported by posts of columns extending to the ground.

**BOARD AND BATTEN** means a type of wall cladding where applied boards are closely spaced, usually placed vertically, the joints of which are covered by narrow wood strips.

**BRIDGE** means a structure that spans over a depression or waterway; typically carries a transportation way such as a footpath, road or railway.

**BUILDING FACADE** means the exterior elevation of a building, extending from grade to the top of the eaves, wall, or parapet, extending the entire length of the building and fronting on public or private streets.

**CANOPY** means any structure other than an awning, made of cloth, metal, or other materials with a frame either attached to, or projecting from, a building, and carried by a frame supported by the ground or sidewalk.

**CERTIFICATE OF APPROPRIATENESS (CA)** means the official document issued by the Historic Preservation Commission approving any application for permission to construct, erect, demolish, relocate, reconstruct, restore or alter any structure designated by the authority of this chapter.

**CHARACTER** means attributes, qualities and features that make up and distinguish a particular place or development and give such a place a sense of definition, purpose and uniqueness.

**CHARACTER-DEFINING** means those architectural materials and features of a building that define the historic nature or character of the building. Such elements may include the form of the building, exterior cladding, roof materials, door and window design, exterior features such as canopies and porches, exterior and interior trim, etc.

**COLUMN** means a slender, vertical element that supports part of a building or structure.

**COMMISSION** means the Historic Preservation Commission of the City of Oklahoma City.

**COMPATIBILITY** means the characteristics of different uses or activities that permit them to be located near each other in harmony and without conflict.

**CONSTRUCTION** means the act or business of building a structure or part of a structure.

**CONTRIBUTING STRUCTURE** means a structure that retains its essential architectural integrity of design and whose architectural style is typical of or integral to a historic district.

**CORNER SIDE FACADE** means a facade facing a side street.

**CORNER SIDE FENCE** means a fence adjacent to a side street.

**CORNER SIDE YARD** means a side yard abutting a street.

**CORNICE** means a horizontal projecting band that caps a building parapet or roof.

**CONTRIBUTING BUILDING/STRUCTURE/SITE** means a building or site which reinforces the visual integrity or interpretability of a historic district. A contributing building is not necessarily "historic" (50 years old or older). A contributing building may lack individual distinction but may add to the historic district's status as a significant and distinguishable socio-cultural entity.

**COPING** means a protective cap, top or cover of a wall or parapet, often of stone, terra cotta, concrete, metal or wood. This may be flat, but commonly is sloping to shed water.

**DEMOLITION** means an act or process that destroys or razes a structure or its appurtenances in part or in whole, or permanently impairs its structural integrity, including its ruin by neglect of necessary maintenance and repairs.

**DEMOLITION BY NEGLECT** means the act or process of neglecting the maintenance and repairs of a building, thus allowing the building to deteriorate to the point where demolition may be necessary.



**DIRECTOR** means the Development Services Director, Planning Director, or Public Works Director, as context dictates.

**DISPLAY WINDOW** means a large area of glass within a storefront opening.

**DISTRICT:** See “Zoning District.”

**EAVE** means the projecting lower edges of a roof, overhanging the wall of a building.

**ENTRANCE AREA** means the point of entry into a building or storefront to provide weather protection and protection from the outward swing of a door. Made up of the following components: door, transom window (above the door), sidelights or display windows and floor area.

**ENTRY** means a door, gate or passage used to enter a building.

**ERECT** means to construct or build.

**FASCIA** means a wide, flat horizontal band or molding on a wall surface with little projection.

**FENCE** means an artificially constructed barrier of any material, or combination of materials, erected to enclose, screen or separate areas.

**FENESTRATION** means the proportion and size of window and door openings and the rhythm, order and arrangement on a building facade.

**FLASHING** means sheet metal or other flexible material formed to prevent water from entering a building or structure at joints or intersections, such as where a roof intersects a wall or chimney.

**HARDSCAPE** means portions of the exterior environment of a site, district, or region that is constructed with masonry or other impermeable materials, including sidewalks, driveways or patios.

**HEIGHT** means the vertical distance from the average grade level to the average level of the roof.

**HIGH STYLE** means the more ornately detailed version of a particular architectural style; used in contrast to simpler examples, both from different periods or the same period; the opposite of vernacular.

**HISTORIC** means important in history. Distinguished from “historical,” which conveys the sense of things or events related to the past, while “historic” conveys a sense of importance.

**HISTORIC BUILDING** means a building important because of its association with a historic event or with the history of a locality. In these Preservation Guidelines and Standards, particular reference is to a landmark of the City of Oklahoma City.

**HISTORIC DISTRICT** means a definable geographic area that contains a number of related historic structures, features or objects united by past events or aesthetically by plan or physical development, and that have been declared an HP (Historic Preservation) or HL (Historic Landmark) by The City of Oklahoma City. These historic districts may or may not have been designated on a state level or included in the National Register of Historic Places.

**HISTORIC FABRIC** means those elements and features of a historic building that are original and contribute to the integrity of the historic building.

**HISTORIC PRESERVATION OFFICER** means the chief staff person responsible for preservation in the City of Oklahoma City's Planning Department. The Historic Preservation Officer also serves as Secretary of the Historic Preservation Commission.

**INFILL CONSTRUCTION** means new construction, or the move of existing structures, on vacant lots or replacement of blighted or thoroughly deteriorated structures within existing neighborhoods or developments.

**IN KIND** means to replace existing materials or features with materials of identical appearance and/or composition.

**INTEGRITY** means a measure of the authenticity of a property's historic identity, evidenced by the survival of physical characteristics that existed during the property's historic period in comparison with its unaltered state.

**INTERIOR SIDE FACADE** means a facade not facing a street or alley.

**INTERIOR SIDE FENCE** means a fence not adjacent to a street or alley.

**INTERIOR SIDE YARD** means a side yard not abutting a street or alley.

**KICKPLATE** means a metal plate (usually brass) attached to the bottom of a door to protect the door from damage.

**LANDMARK** means an individual structure, building, site or monument which contributes to the historical, architectural or archeological heritage of the City.

**LANDSCAPE** means the whole of the exterior environment of a site, district, or region, including landforms, trees, plants, rivers and lakes and the built environment.

**LANDSCAPE ELEMENTS** means those elements that contribute to the landscape such as exterior furniture, decks, patios, outdoor lighting and other elements that may be located in conjunction with a landscape.

**LINTEL** means a horizontal structural element (wood framing or a steel beam), which spans a door, window or cased opening and supports the wall above the opening.

**LOT** means a parcel of land having fixed boundaries and designated on a plat, or by a metes and bounds description, and of sufficient size to meet minimum use regulations and development standards.

**MAIN BUILDING** means the primary historic building in an individual historic site.

**MAINTENANCE** means conformance of a building, and its facilities, to the code under which the building was constructed or to another applicable maintenance code.

**MODIFY or MODIFICATION** means to make changes to an existing structure.

**MORTAR** means the materials used to fill the joints of masonry.

**MORTAR JOINT** means masonry joint between masonry units, such as brick or stone, filled with mortar to transfer the load, provide a bond between the units and keep out the weather.

**MORTAR MIX** means the chemical composition (and proportions of these ingredients) of the mortar used in masonry.

**MOVING** means the relocation of a structure on its site or to another site.

**NATURAL FEATURES** means features or elements of the exterior environment that are substantially unaltered by human activity such as landforms, trees, plants, rivers and lakes.

**NEW CONSTRUCTION** means the act of adding to an existing structure or erecting a new principal or accessory structure or appurtenances to a structure, including but not limited to buildings, extensions, outbuildings, fire escapes and retaining walls.

**NON-CONTRIBUTING (BUILDING/STRUCTURE/SITE)** means a building, structure or site that does not add to the historic significance of a property or district, and which detracts from the visual integrity or interpretability of a historic district.

**ORDINARY MAINTENANCE AND REPAIR** means any work meant to remedy damage or deterioration of site elements or a structure or its appurtenances that involves no change in materials, dimensions, design, configuration, texture, surface coating or visual appearance.

**ORIGINAL:** Features, components, materials or other elements of a structure that were part of its initial construction; or, structures that were part of the initial development of a site (such as accessory structures built at the same time as the related primary structure). Features or structures that are not original to a structure or site may have gained historic significance in their own right, and may still be considered "historic."

**ORNAMENTATION** means any decorative objects or series of objects, which are added to the basic structure to enhance its visual appearance.

**PARAPET** means the part of an exterior wall, which extends entirely above the roof.

**PARKING LOT** means any off-street, unenclosed, ground-level facility used for the purpose of temporary storage of vehicles, which cannot exceed seven days. Enclosed parking facilities, such as multi-story garages or parking facilities constructed within the confines of a larger building or structure, or parking facilities associated with single-family and two-family residential developments are not included within this definition.

**PARKING STRUCTURE** means a structure (building), which houses parked vehicles.

**PERGOLA** means an open grid, supported by rows of columns, for growing vines; most often a series of wood beams supporting narrow boards supported by wood columns; may be attached to a building or covering a garden or walkway.

**PORCH** means a covered and floored area of a building, especially a house, that is open at the front and usually the sides.

**PORTE-COCHERE** means a covered or uncovered platform that projects from the exterior wall of a building, has direct access to the street level of the building, and has no roof supporting walls on three sides, and which may be supported by posts.

**PRESERVATION** means the adaptive use, conservation, protection, reconstruction, restoration, rehabilitation or stabilization of sites, buildings, districts, structures or monuments significant to the heri-

tage of the people of Oklahoma City. The following definitions shall apply:

- A. *Adaptive use*: The restrained alteration of an historical or architectural resource to accommodate uses for which the resource was not originally constructed, but in such a way so as to maintain the general historical and architectural character.
- B. *Conservation*: In terms of historical preservation, the sustained use and appearance of a structure or area, maintained essentially in its existing state.
- C. *Protection*: In terms of historical preservation, the security of a resource as it exists through the establishment of the mechanisms of this chapter.
- D. *Reconstruction*: In terms of historical preservation, the act or process of duplicating the original structure, building form and materials by means of new construction based on documentation of the historic condition.
- E. *Rehabilitation*: See “Rehabilitation.”
- F. *Restoration*: The process of accurately recovering all, or part of the form and detail of a resource and its setting, as it appeared at a particular period of time, by means of the removal of later work and the replacement of missing earlier work.
- G. *Stabilization*: The process of applying measures designated to halt deterioration and to establish the structural stability of an unsafe or deteriorated resource while maintaining the essential form as it presently exists without noticeably changing the exterior appearance of the resource.

**PROPORTION** means the dimensional relationship between one part of a structure or appurtenance and another. Facade proportions involve relationships such as height to width, the percent of the facade given to window and door openings, the size of these openings, and floor-to-ceiling heights. Often described as a ratio, proportions may be vertical (taller than wide), horizontal (wider than tall) or non-directional (equally tall and wide).

**PROTECTED** means an architectural or landscaping feature that must be retained and its’ historic appearance maintained, as near as practical, in all aspects.

**RAFTER** means any of the parallel beams that support a roof.

**RAMP** means a sloped surface that makes a transition between two different levels; typically used to provide access to a building or raised surface for those persons with disabilities.

**REAL ESTATE SIGN** means a sign that advertises the sale or lease of an interest in real property.

**RECONSTRUCTION** means the act or process of duplicating the original structure, building form and materials by means of new construction.

**REHABILITATION** means the act or process of making possible a compatible use for a property through repair, alterations and additions, while preserving those portions or features, which convey its historic, cultural or architectural values.

**RENOVATION** means the act or process of repairing and/or changing an existing building for new use, or to make it functional; this may involve replacement of minor parts.

**REPAIR** means fixing a deteriorated part of a building, structure or object, including mechanical or electrical systems or equipment, so that it is functional; may involve replacement of minor parts.

**REPLACEMENT** means to interchange a deteriorated element of a building, structure or object with a new one that matches the original element.

**REPLICATE** means to copy or reproduce an historic building or element.

**REPOINTING** means repairing existing masonry joints by removing defective mortar and installing new mortar.

**RESTORATION** means the act or process of accurately depicting the form, features and character of a project as it appeared at a particular period of time.

**RHYTHM** means a regular pattern of shapes including but not limited to windows, doors, projections, and heights within a building, structure, or monument, or a group of the same.

**RIGHT OF WAY** means the land used for a transportation corridor, such as a street, alley or railroad; typically owned and maintained by the government.

**SCALE** means the harmonious proportions of parts of a building, structure or monument to one another and to the human figure.

**SCREENING** means construction or vegetation which the essential function is to separate, protect, conceal, or shield from view but not support.

**SETBACK** means the required distance between every structure and the lot line of the lot on which it is located. See “Yard,” “Yard, Corner Side,” “Yard, Front,” “Yard, Rear,” and “Yard, Side.”

**SHUTTER** means a hinged panel that closes a window or door opening in addition to the standard door or window, may be solid, or with cutouts or ventilation slats.

**SIGN** means any structure or part thereof or any device, permanently or temporarily attached to, painted on, supported by, or represented on a building, fence, post, or other structure which is used or intended to be used to attract attention. “Sign” shall not include flag, pennant, or insignia of any nation, association of nations, State, City, or other political unit.

**SIGNIFICANT CHARACTERISTICS of HISTORICAL or ARCHITECTURAL RESOURCES:**

Those characteristics that are important to or expressive of the historical, architectural or cultural quality and integrity of the resource and the setting and includes but is not limited to building material, detail, height, mass, proportion, rhythm, scale, setback, setting, shape, street accessories, and workmanship. The following definitions shall apply:

- A. *Building Materials*: The physical characteristics that create the aesthetic and structural appearance of the resource, including but not limited to, a consideration of the texture and style of the components and their combinations, such as brick, stone, shingle, wood, concrete or stucco.
- B. *Detail*: Architectural aspects that, due to particular treatment, draw attention to certain parts or features of a structure.

- C. *Height*: The vertical distance from the average grade level to the average level of the roof.
- D. *Proportion*: The dimensional relationship between one part of a structure or appurtenance and another.
- E. *Rhythm*: See “Rhythm.”
- F. *Scale*: The harmonious proportion of parts of a building, structure or monument to one another and to the human figure.
- G. *Setting*: The surrounding buildings, structures, monuments, or landscaping that provides visual aesthetics or auditory quality to historic or architectural resources.
- H. *Shape*: The physical configuration of structures of building or monuments and their component parts, including but not limited to roofs, doors, windows, and facades.
- I. *Street Accessories*: Those sidewalks or street fixtures that provide cleanliness, comfort, direction, or safety and are compatible in design to their surroundings and include but are not limited to garbage receptacles, benches, signs, lights, hydrants and landscaping, including but not limited to trees, shrubbery and planters.

**SILL** means the horizontal bottom member of a window frame or other frame.

**SITE** means the land on which a building or other feature is located.

**SOFFIT** means the exposed undersurface of any overhead component of a building, such as an arch, balcony, beam, cornice or roof overhang.

**STAND ALONE** means a building or structure that is separate from, and not attached to any existing or adjacent structure or building.

**STOREFRONT** means a ground level facade of a commercial building with display windows with minimal mullions or columns; this is often with a recessed entrance. Storefronts were typically provided at retail establishments.

**STOREFRONT COLUMN** means slender vertical elements within the storefront opening that help support the lintel.

**STORY** means the space between two floors of a structure, or between a floor and roof.

**STREETFRONT** means the environment encompassing a street or road within one block, and includes buildings, landscaping, street furniture and signage.

**STRUCTURE** means anything constructed or erected, the use of which requires permanent location on the ground or which is attached to something having a permanent location on the ground. This includes but not limited to main and accessory buildings, advertising signs, billboards, poster panels, fences, walls, driveways, sidewalks and parking areas.

**SYNTHETIC MATERIALS** means building materials that are manufactured with man-made or artificial components as opposed to materials derived from nature sources, such as plants, trees or earth.

**TRANSOM** means a glass panel above a horizontal frame bar (transom bar) atop a display window or door, used to allow greater light into an interior room or building interior.

**TRELLIS** means an open grating or latticework of either wood or metal placed vertically on a site and typically supported by wood columns, and often used as a screen and usually supporting climbing vines.

**UPPER FACADE** means the mostly solid part of the wall above the display window. May be a plain surface on a one-story building, or contain rows of windows defining the number and location of floors in a multi-story building, and may include decorative bands or patterns.

**VERNACULAR** means a building built without being designed by an architect or someone with similar formal training; often based on traditional or regional forms; not high style.

**VISIBILITY FROM A PUBLIC WAY** means able to be seen from any public right-of-way, or other place, whether privately or publicly owned, upon which the public is regularly allowed or invited to be.

**WALL** means a structure or hedgerow that provides a physical barrier, typically constructed of a solid material such as stone or rock.

**YARD:** means an open space at grade, other than a court or plaza, between a structure and the adjacent lot lines, unoccupied and unobstructed by any portion of a structure from the ground upward, except where otherwise specifically provided in this chapter. In measuring a yard for the purpose of determining the depth of the front yard, rear yard or side yard, the minimum horizontal depth between the lot line and a building or structure shall be used.

**YARD, CORNER SIDE:** means a side yard on a corner lot which abuts a street.

**YARD, FRONT:**

- A. An open area facing and abutting a street and extending across the front of the lot between the side lot lines and having a minimum horizontal depth measured from the street equal to the depth of the minimum front yard specified for the district in which the lot is located. The required front yard line represents the line in front of which no building or structure may be erected, other than steps, unenclosed porches, canopies, marquees and carports as may be permitted in this chapter.
- B. In commercial or industrial uses, the front yard shall always be adjacent to an expressway or arterial if the lot abuts such a facility.

**YARD, REAR:** An open area that extends across the rear of the lot between side lot lines and which has a minimum depth measured from the rear lot line as specified for the zoning district in which the lot is located. Steps, unenclosed porches and unenclosed balconies may extend into the rear yard as may be permitted in this chapter. On both corner lots and interior lots, the rear yard shall, in all cases, be at the opposite end of the lot from the front yard.

**YARD, SIDE:** An open area which extends between the required front yard and the required rear

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## APPENDIX B

### Secretary of the Interior's

### ***STANDARDS FOR THE TREATMENT OF HISTORIC PROPERTIES, 1995***

*These Secretary of the Interior's Standards have been developed to guide work undertaken on historic structures; the intent is to assist with the long-term preservation of a property's significance through the preservation, restoration, rehabilitation or reconstruction of historic materials and features. These Standards apply to approaches, treatments, and techniques that are consistent with the Preservation, Restoration, Rehabilitation and Reconstruction of historic properties, and examples are provided for recommended work. Examples that adversely affect the historic character of a historic property are listed as 'not recommended'. These Standards are reproduced here for use by property owners in determining the appropriate treatment for a historic property.*

**PRESERVATION** is defined as the act or process of applying measures necessary to sustain the existing form, integrity and materials of an historic property. Work, including preliminary measures to protect and stabilize the property, generally focuses upon the ongoing maintenance and repair of historic materials and features rather than extensive replacement and new construction. New exterior additions are not within the scope of this treatment; however, the limited and sensitive upgrading of mechanical, electrical and plumbing systems and other code-required work to make the properties functional is appropriate within a preservation project.

- A property will be used as it was historically, or be given a new use that maximizes the retention of distinctive materials, features, spaces and spatial relationships. Where a treatment and use have not been identified, a property will be protected and, if necessary, stabilized until additional work may be undertaken.
- The historic character of a property will be retained and preserved. The replacement of intact or repairable historic materials or alteration of features, spaces and spatial relationships that characterize a property will be avoided.
- Each property will be recognized as a physical record of its time, place and use. Work needed to stabilize, consolidate and conserve existing historic materials and features will be physically and visually compatible, identifiable upon close inspection, and properly documented for future research.
- Changes to a property that have acquired historic significance in their own right will be retained and preserved.
- Distinctive materials, features, finishes and construction techniques or examples of craftsmanship that characterize a property will be preserved.
- The existing condition of historic features will be evaluated to determine the appropriate level of intervention needed. Where the severity of deterioration requires repair or limited replacement of a distinctive feature, the new material will match the old in composition, design, color and texture.

- Chemical or physical treatments, if appropriate, will be undertaken using the gentlest means possible. Treatments that cause damage to historic materials will not be used.
- Archeological resources will be protected and preserved in place. If such resources must be disturbed, mitigation measures will be undertaken.

**RESTORATION** is defined as the act or process of accurately depicting the form, features and character of a property as it appeared at a particular period of time by means of the removal of features from other periods in its history and reconstruction of missing features from the restoration period. The limited and sensitive upgrading of mechanical, electrical and plumbing systems and other code-required work to make properties functional is appropriate within a restoration project.

- A property will be used as it was historically or be given a new use which reflects the property's restoration period.
- Materials and features from the restoration period will be retained and preserved. The removal of materials or alteration of features, spaces and spatial relationships that characterize the period will not be undertaken.
- Each property will be recognized as a physical record of its time, place and use. Work needed to stabilize, consolidate and conserve materials and features from the restoration period will be physically and visually compatible, identifiable upon close inspection, and properly documented for future research.
- Materials, features, spaces and finishes that characterize other historical periods will be documented prior to their alteration or removal.
- Distinctive materials, features, finishes and construction techniques or examples of craftsmanship that characterize the restoration period will be preserved.
- Deteriorated features from the restoration period will be repaired rather than replaced. Where the severity of deterioration requires replacement of a distinctive feature, the new feature will match the old in design, color, texture and where possible, materials.
- Replacement of missing features from the restoration period will be substantiated by documentary and physical evidence. A false sense of history will not be created by adding conjectural features, features from other properties, or by combining features that never existed together historically.
- Chemical or physical treatments, if appropriate, will be undertaken using the gentlest means possible. Treatments that cause damage to historic materials will not be used.
- Archeological resources affected by a project will be protected and preserved in place. If such resources must be disturbed, mitigation measures will be undertaken.
- Designs that were never executed historically will not be constructed.

**REHABILITATION** is defined as the act or process of making possible a compatible use for a property through repair, alterations and additions while preserving those portions or features which convey its historical, cultural or architectural values.

- A property will be used as it was historically or be given a new use that requires minimal change to its distinctive materials, features, spaces and spatial relationships.
- The historic character of a property will be retained and preserved. The removal of distinctive materials or alteration of features, spaces and spatial relationships that characterize a property will be avoided.
- Each property will be recognized as a physical record of its time, place and use. Changes that create a false sense of historical development, such as adding conjectural features or elements from other historic properties, will not be undertaken.
- Changes to a property that have acquired historic significance in their own right will be retained and preserved.
- Distinctive materials, features, finishes and construction techniques or examples of craftsmanship that characterize a property will be preserved.
- Deteriorated historic features will be repaired rather than replaced. Where the severity of deterioration requires replacement of a distinctive feature, the new feature will match the old in design, color, texture and where possible, materials. Replacement of missing features will be substantiated by documentary and physical evidence.
- Chemical or physical treatments, if appropriate, will be undertaken using the gentlest means possible. Treatments that cause damage to historic materials will not be used.
- Archeological resources will be protected and preserved in place. If such resources must be disturbed, mitigation measures will be undertaken.
- New additions, exterior alterations or related new construction will not destroy historic materials, features and spatial relationships that characterize the property. The new work will be differentiated from the old and will be compatible with the historic materials, features, size, scale and proportion and massing to protect the integrity of the property and its environment.
- New additions and adjacent or related new construction will be undertaken in such a manner that, if removed in the future, the essential form and integrity of the historic property and its environment would be unimpaired.

**RECONSTRUCTION** is defined as the act or process of depicting, by means of new construction, the form, features and detailing of a non-surviving site, landscape, building, structure, or object for the purpose of replicating its appearance at a specific period of time and in its historic location.

- Reconstruction will be used to depict vanished or non-surviving portions of a property when documentary and physical evidence is available to permit accurate reconstruction with minimal conjecture and such reconstruction is essential to the public understanding of the property.
- Reconstruction of a landscape, building, structure, or an object in its historic location will be preceded by a thorough archeological investigation to identify and evaluate those features and artifacts which are essential to an accurate reconstruction. If such resources must be disturbed, mitigation measures will be undertaken.
- Reconstruction will include measures to preserve any remaining historic materials, features and spatial relationships.
- Reconstruction will be based on the accurate duplication of historic features and elements substantiated by documentary or physical evidence rather than on conjectural designs or the availability of different features from other historic properties. A reconstructed property will re-create the appearance of the non-surviving historic property in materials, design, color and texture.
- A reconstruction will be clearly identified as a contemporary re-creation.
- Designs that were never executed historically will not be constructed.

**APPENDIX C - BIBLIOGRAPHY AND SOURCES**

“Building Deconstruction,” at website <http://www.advancedrestoration.com/>

“Downtown Littleton, Colorado Design Review Guidelines.” Draft Guidelines, Littleton, Colorado.

“Energy Efficiency and Renewable Energy: Your Home: Windows,” at website [http:// www.energysavers.gov/](http://www.energysavers.gov/)

Energy Heritage. "A guide to improving energy efficiency in traditional and historic homes." Edinburgh, Scotland: Changeworks, n.d.

English Heritage. “Building Regulations and Historic Buildings: Balancing the needs for energy conservation with those of building conservation.” 2002.

Giuliano, Meg, and Ann Stephenson. “Energy Efficiency, Renewable Energy, and Historic Preservation: A Guide for Historic District Commissions.” Portsmouth, New Hampshire: Clean Air-Cool Planet, 2009.

Gray and Pape, Inc. “Over-the-Rhine Green-Historic Study: Exploring the Intersection Between Environmental Sustainability and Historic Preservation.” Cincinnati, Ohio: Over The Rhine Foundation, 2009.

“Historic Preservation and Sustainability.” Report prepared by CHRS, Inc. Cheltenham, Pennsylvania, n.d.

Howe, Jim, Ed McMahon, and Luther Propst, *Balancing Nature and Commerce in Gateway Communities*. Washington, D.C., Covelo, California: Island Press, 1997.

“It’s Easy Being Green: Sustainability in Bayfield From a Historic Preservation Perspective.” Bayfield, Wisconsin: City of Bayfield, WI, 2002.

Knapik, Michelle, ed. “Philadelphia High-Performance Building Renovation Guidelines.” Philadelphia: City of Philadelphia, 2004.

Knight, Dennis. “Better Buildings.” Charleston, South Carolina: Charleston Green Committee, 2009.

Kooles, Kimberly. “Adapting Historic District Guidelines for Solar and Other Green Technologies.” At National Trust for Historic Preservation Forum Journal Fall 2009 online at <http://www.preservationnation.org/issues/sustainability/solar-panels/additional-resources/NTHP-Forum-Article-2009-Solar-and-HD.pdf>

- Leimenstoll, Jo and Ramsey. "Davidson Historic District Guidelines." Davidson, North Carolina: Town of Davidson, 2009.
- "Lexington, Kentucky Local Historic District and Landmark (H-1) Design Review Guidelines." Lexington, Kentucky, [www.lexingtonky.gov](http://www.lexingtonky.gov).
- "Loudoun County Historic and Cultural Conservation District Guideline." Leesburg, VA: Loudoun County Department of Planning, 2008.
- Oklahoma City, Oklahoma QuickLinks, People QuickLinks, "Housing Characteristics," at website <http://quickfacts.census.gov/qfd/states/40/4055000lk.html>
- "Putting Down Roots, Landscape guidelines for the selection, care and maintenance of trees in central Oklahoma." Oklahoma City Planning Department, Oklahoma City, Oklahoma, 2009.
- "Secretary of the Interior's Standards for Rehabilitation & Illustrated Guidelines on Sustainability for Rehabilitating Historic Buildings." Washington, D.C. National Park Service, 2011.
- SELC Report on Growth in Middle Tennessee*, Internet; accessed Oct 30, 2003 at [http://www.southernenvironment.org/Cases/smart\\_growth\\_tn/growing\\_report.shtml](http://www.southernenvironment.org/Cases/smart_growth_tn/growing_report.shtml)
- Synertech Systems Corporation. "Making Your Historic Building Energy Efficient: Volume 1 Principles & Approaches." Boulder, Colorado: Office of Environmental Affairs, 2007.
- Wabash Valley Trust. "Green Recommendations for Historic Rehabilitation and Urban Infill." Lafayette, Indiana: Wabash Valley Trust, 2010.
- Way, Ginny. "Sustainable Preservation: An Addendum to Building with Nantucket in Mind." Nantucket, MA: Clean Air-Cool Planet, 2009.
- "Windows and Sustainability: An Environmental Perspective," at website <http://continuingeducation.construction.com/article.php?L=20&C=211&P=8>
- Winter, Nore'. "Developing Sustainability Guidelines for Historic Districts." Washington, D.C.: National Trust for Historic Preservation, 2011.
- Winter, Nore'. "Developing "Green"-Friendly Guideline: Advice for Preservation Commissions." At National Trust for Historic Preservation Forum December 2010 online at <http://www.preservationnation.org/forum/resource-center/forum-library/public-articles/developing-green-friendly.html>