2023 Design & Architectural Standards

Office of Multifamily Housing | **January 2023**

Contents

A. Introduction and Scope

The following Design and Architectural Standards ("Standards") apply to all Ohio Housing Finance Agency (OHFA) multifamily affordable housing. These Standards represent the minimum requirements necessary to receiving OHFA funding. Standards may be increased or modified by programmatic requirement or incentive; applicants should consult the relevant program guidelines for further information.

The intent of these Standards is to:

- Ensure consistency in the design approval process;
- Promote the use of durable materials that reduce long-term maintenance costs;
- Create a healthy living environment for residents of all backgrounds and abilities;
- Provide options for meeting requirements that can be tailored to location and population being served;
- Enhance energy efficiency to reduce costs to the project and residents; and
- Appropriately balance high quality materials with cost containment principles.

OHFA values the creation and preservation of safe, healthy, and decent affordable housing for low and moderate income Ohioans, and requires development partners to uphold this overarching value as well. These standards serve as a critical guide in achieving this mission.

Applicability

Funding Programs

These Standards apply to all new construction, rehabilitation, and adaptive reuse developments seeking funding through any of the programs administered by the OHFA Office of Multifamily Housing.

Exceptions

All program participants must conform to these requirements unless waived by OHFA in writing. OHFA will accept requests for exception to specific requirements as noted throughout the document and as summarized in Appendix A. Additionally, OHFA will evaluate certain aspects of the Standards that may require modification in order to meet the unique site, design or use of the development. In this event, OHFA will consider modification requests on a case by case basis.

All requests for exceptions must be submitted using the OHFA Exception Request form, must include reasonable justification for the exception, and must be submitted to OHFA on or before the date indicated in the respective program calendar. The OHFA staff architect will review requests and make a recommendation to the management team to accept, deny, or modify the exception. A final determination will be made by OHFA by the date indicated in the program calendars. All exceptions granted are based on the unique circumstances of the project and the QAP, Design and Architectural Standards (DAS), and guidelines for the funding year, and will not be transferred to other projects.

In the event that Code compliance creates a conflict with OHFA Standards requirement, the Developer must notify OHFA of the conflict between the Code and OHFA's Architectural Standards.

Notice & Disclaimer

All requirements are exclusive of federal, state, and local law or regulation that may further dictate design requirements. If there is a conflict between the requirements of applicable codes and/or these Standards, the most stringent requirement will prevail. During the construction process, owners/developers and/or architects will be asked to certify compliance with applicable regulations.

Nothing in these Standards must be construed to waive, override, modify, or extinguish any legal or regulatory responsibility, including those governing accessibility issues. OHFA will not certify project adherence to building code or other legal or design requirements. OHFA must not, by the execution or

performance of any architectural review function, assume liability or otherwise become responsible for any owner, developer, architect, construction contractor or other person's obligation; applicants and funding recipients are explicitly advised to seek independent legal advice regarding non-OHFA design and construction requirements particularly as they relate to accessibility.

Penalties

Violations of the requirements set forth in these Standards, failure to honor commitments made in the application process, or other instances of noncompliance with OHFA requirements may result in any or all of the sanctions as outlined in the 2022-2023 Qualified Allocation Plan.

B. Definitions

Unless otherwise noted, all definitions must be the same as the building code applicable to the construction type.

Adaptive Reuse: The renovation and reuse of an existing structure for a purpose other than that which it was originally built or designed for.

Circulation Space: The path inside a building for access to living units, storage areas, common areas, ingress and egress areas, and other spaces designed for resident use.

- Examples: Hallways, stairways, and areas that lead to other rooms

Common Space: A room or space outside the residential living unit designed for resident use that does not impose a usage fee or participation in an activity for free enjoyment of the space.

- Examples:
  - Circulation space- hallways, elevators, lobby, etc.
  - Community space- meeting rooms, community rooms, multipurpose rooms, fitness center, etc.
  - Property management space- management offices

Components/Sub-Component: A portion of a building system, piece of equipment, or building element.

Dedicated Program Space: A room or space outside the residential living unit designed exclusively for tenant use that has a fixed, program-driven purpose. These spaces are not considered part of Common Space.

- Examples: Counseling space, wellness and health clinic areas, day care centers

Design and Construction Features Form (DCFF): The form submitted with the application that states all of the design-related features that will be included in the project. Compliance throughout the rest of the project period is checked against this information. The DCFF can be found on OHFA's Guidelines, Applications, and Forms webpage.

Expected Useful Life (EUL): The average amount of time in years that an item, component or system is estimated to function without material repair when installed new and assuming routine maintenance is practiced. This is also used as the standard for new material durability/ acceptability in rehabs, adaptive reuse and new construction. A new material must conform to the applicable and acceptable use as defined in the EUL table.

Major Building Component (MBC): Major refers to the importance of the component and the extent of the replacement (i.e. roof structures, wall or floor structures, foundations and plumbing, central heating and air conditioning, or electrical systems). The element must be significant to the building and its use, normally expected to last the useful life of the building, and not minor or cosmetic. Total replacement is not required

but the greater part (at least 50%) must be replaced. The term provides a great deal of latitude, and good judgement is necessary and expected. OHFA architectural staff and OHFA Multifamily Development Staff will make the determination.

Major Building Systems (MBS): Interacting or independent components or assemblies, which form single integrated units that comprise a building and its site work. This includes Major Components, Components, and Sub-Components.

Net Rentable Area: The sum of the unit area, balcony area, garage (if included with the unit) and tenant storage area.

New Construction: Site preparation for, and construction of, entirely new structures whether or not the site was previously occupied.

Physical Capital Needs Assessment (PCNA): An inspection and resulting plan for a property that provides detail on the property's current overall physical condition and identifies immediate physical needs, significant deferred maintenance, and an opinion of costs to remedy physical deficiencies. EUL values are used in a Capital Needs Assessment when assessing the current condition. Remaining useful life (RUL) is used to evaluate existing materials in meeting OHFA required durability.

Remaining Useful Life (RUL): Subjective estimate based upon observations, or average estimates of similar items, components, or systems, or a combination thereof, of the number of remaining years that an item, component, or system is estimated to be able to function in accordance with its intended purpose before warranting replacement. Such period of time is affected by the initial quality of an item, component, or system, the quality of the initial installation, the quality and amount of preventive maintenance exercised, climatic conditions, and extent of use.

Safe Harbor: An objective and recognized standard, guideline, or code that, if followed without deviation, ensures compliance with specific requirements. For purposes of the Standards, the term safe harbor is used in the context of the standards used for compliance with design and construction requirements of the Fair Housing Act and the standards used for compliance with Section 504.

Substantial Rehabilitation: To be considered substantial rehabilitation, a threshold criteria for all acquisition and rehabilitation projects funded by the Office of Multifamily Housing, the following conditions must be met: 1) when the required repairs, replacements, and improvements involve the replacement of two or more major building components, and 2) the hard construction dollars of Rehabilitation per unit equals $40,000 or more. Interior finishes and casework are assumed to be included in all OHFA funded rehabilitation projects and are not considered a major building component for the purpose of determining if the substantial rehabilitation threshold has been met. Additionally, OHFA requires that all building systems/components in need of replacement and/or repair as identified in the PCNA (based on RUL of less than 50%) be included in the scope of work, regardless if these elements are used to meet the threshold standard.

Support Space: A room or space outside the residential living unit that is not intended for resident use.

- Examples: Mechanical areas, janitor closets, security offices, fire control stations, supply and mechanical storage areas

OHFA Square Footage Calculation

Developments must use the following standards for measuring square footage:

- **Multifamily buildings**
  - Building Owners and Managers Association (BOMA) - Multi-Unit Residential Standard, Gross Method (ANSI/BOMA Z65.4)

- **Single-family, 1, 2, or 3-family dwelling, or townhome buildings**
    - BOMA - Gross Areas Standard (ANSI/BOMA Z65.3)

The area calculations for either of the above must include 100% of the building in which the project is contained regardless of whether that space is leased or condominimized to another entity, and includes:

- All buildings, including those with Building Identification Numbers (BINs)
- Free-standing community buildings
- Maintenance buildings and sheds
- Picnic shelters/gazebos
- Garages
- Carports
- Porches
- Commercial space
- Market rate unit space
- Manager unit space
- Common space
- Dedicated Program Space
- Tenant storage

The calculation should not include:

- Trash enclosures
- Concrete patios without roofs
- Sidewalks

All square footages must be calculated and certified in the Affordable Housing Funding Application (AHFA) or Gap Financing Application (GFA) and the Design and Construction Features Form (DCFF) by the Architect of Record.

C. Code Compliance

All developments must conform to the below requirements:

- **Developments with four or more units:**
    - Ohio Administrative Code 4101:1 Board of Building Standards: Ohio Building Code (OBC), including any and all referenced codes
- **Developments with three or fewer units:**
    - Ohio Administrative Code 4101:8 Board of Building Standards: Residential Code of Ohio (RCO), including any and all referenced codes

All developments must also conform to the requirements set forth in the following, as applicable:

- Ohio Department of Development Residential Rehabilitation Standards
- Local codes, zoning codes, and fire codes as required by the jurisdiction or funding source.
- If receiving funding from the **HOME Investment Partnerships Program**, developments must meet all requirements as outlined in 24 CFR §92.251 – Property Standards (also Appendix D).
- If receiving funding from the **National Housing Trust Fund**, developments must meet all requirements as outlined in 24 CFR §93.301 – Property Standards (also Appendix E).
- If receiving funding from the **Community Development Block Grant – Disaster Recovery program**, developments must meet all requirements as outlined in 83 FR 5844 (also Appendix F).

D. Lead-Based Paint Hazard Reduction

OHFA is committed to the reduction of lead-based paint hazards in housing throughout Ohio. Deteriorating lead-based paint and its resulting lead dust are the most common causes of elevated blood lead levels in children in Ohio. Because of Ohio's aging housing stock, many residents are susceptible to lead hazards. Over 25% of housing units in Ohio were built before 1950, when the first laws banning lead-based paint were enacted. Over two-thirds of housing units in Ohio were built in 1979 or earlier, pre-dating the federal ban on lead in house paint.

Applicability

The requirements in this section apply to all properties seeking OHFA funding for rehabilitation of a pre-1978 structure. Review of lead-based paint is required as a non-scope consideration in the Phase I.

Certain properties may be exempt and are able to seek an exception to this requirement:

- Properties found not to have lead-based paint during earlier testing that meets the requirements of prior evaluations.
- Properties where all lead-based paint has been identified and removed using approved methods.
- Properties in an area where state and local governments banned lead-based paint prior to January 1, 1978.

Additionally, certain federal and state funding sources already require developments utilizing their funding to adhere to program-specific requirements for the reduction of lead-based paint hazards. Developments subject to these program-specific requirements should continue to follow the applicable guidance related to lead-based paint.

Requirements

Developments must comply with the requirements outlined in the HUD Lead Safe Housing Rule (24 CFR 35), specifically subparts A, B, J, and R as well as any other subparts applicable to the project. In general, this means projects must:

- Conduct an evaluation of lead-based paint hazards (i.e., a risk assessment, paint inspection, or a combination of the two).
    - For properties in good condition, a lead hazard screen risk assessment may be performed first to determine whether a full risk assessment is necessary.
- Control identified lead hazards per Ohio Department of Health and HUD hazard reduction requirements.
- Pass clearance testing of work area prior to re-occupancy.
- Inform occupants of evaluation and hazard control activities and results, and provide the HUD/EPA Lead Hazard information disclosure pamphlet.

Develop a lead hazard control plan for the property which includes an ongoing lead-safe maintenance program. Additionally, developments must meet all other local, state, and federal requirements related to lead-based paint as may apply including those related to disclosure, professional qualifications, lead-safe work practices, etc.

Additional Resources

- HUD Lead Safe Housing Rule (24 CFR 35)
- HUD Guidelines for the Evaluation and Control of Lead-based Paint in Housing
- HUD/EPA Lead Disclosure Rule
- EPA's Lead Renovation, Repair and Painting Rule (RRP) Rule
- OAC Chapter 3701-32: Lead Hazard Abatement
- ORC 5302.30: Property disclosure form required for all residential real property transfers

- ODOD's Residential Rehab Standards (RRS): Chapter 7 - The Elimination of Lead-Based Paint Hazards and Appendix 7-A Lead-Based Paint Requirements and Guidance

E. Radon Reduction and Prevention

Radon is a cancer-causing, radioactive gas. It comes from the natural breakdown of naturally-occurring uranium, thorium, or radium in rock, soil and water. Radon can get into the air in buildings by traveling through the ground and through seams, joints, utility penetrations and cracks in building foundations and slabs. Eventually, it decays into radioactive particles that can become trapped in the lungs when inhaled. As these particles decay, they release radiation that can damage lung tissue and lead to lung cancer.

The U.S. Environmental Protection Agency (EPA) has divided states and counties into three radon risk zones.

- Zone 1: Counties with predicted average indoor radon screening levels greater than 4 pCi/L
- Zone 2: Counties with predicted average indoor radon screening levels from 2 to 4 pCi/L
- Zone 3: Counties with predicted average indoor radon screening levels less than 2 pCi/L

Elevated levels of radon can be found in any of the three zones, but buildings in Zone 1 are at particularly high risk for having elevated levels, and the need for addressing radon in those locations is of greatest importance. As seen in the map, all of Ohio falls into either Zone 1 or Zone 2.

The EPA has developed an action level for radon of 4 picocuries per liter of air (pCi/L). A picocurie is a measure of radioactivity. If a building's indoor radon concentration is at or above 4 pCi/L, mitigation is recommended. If the concentration is between 2-4 pCi/L, mitigation should be considered.

Applicability

The requirements in this section apply to all OHFA-funded developments, including both new construction and rehabilitation/adaptive reuse. Review of radon is required as a non-scope consideration in the Phase I.

Additionally, certain federal and state funding sources already require developments utilizing their funding to adhere to program-specific requirements for radon testing and mitigation (for example, any development subject to HUD's environmental review regulations at 24 CFR Part 50 and Part 58). Developments subject to these program-specific requirements should continue to follow the applicable guidance related to radon.

Radon testing, mitigation, and laboratory work for developments to be funded with OHFA resources must be performed by individuals who meet the certification and licensure requirements as outlined in OAC 3701-69.

Requirements

Developments must incorporate radon-resistant construction techniques into their project. Radon-resistant construction techniques include:

- a gas permeable layer such as gravel beneath the lowest building floor slab,
- a vapor retarding layer on top of the permeable layer,
- a vertical vent pipe from the permeable layer through the roof to vent outside,
- sealing and caulking of all cracks, joints and penetrations in the slab or basement, and
- installation of a junction box in the attic or highest interior space for use with an in-line vent fan if one is required for future active removal of radon.

Once construction/renovation is complete, but prior to occupancy, radon testing must be conducted in accordance with ANSI/AARST MAMF-2017 (Revised 1/21), or the most current testing standard for the

applicable structure. This includes testing in 100% of all ground-contact dwelling units and non-residential ground-contact rooms, as well as 10% of the upper floor dwelling units (with at least one unit tested on each floor) to determine the need for installation of exhaust fans (i.e. “active” removal).

If any sample result from the post-construction sampling meets or exceeds 4.0 pCi/L of radon, exhaust fans must be installed to convert the passive radon removal systems to active removal systems. Any area with test results above the action level must be retested after installation of fans until satisfactory results are obtained.

Rehabilitation Projects

Rehabilitation Projects may request an exception to the requirement for a radon mitigation system based on pre-construction testing results below 4.0pCi/L.

If the highest result of testing conducted before construction is between 2 and 4 pCi/L, it is recommended that passive system is installed in all impacted areas.

Radon levels fluctuate from day to day and across a year. The age of building, construction type, changes to HVAC equipment including fresh air exchanges, and other changes to air infiltration all impact radon levels. As a building becomes more air tight the level of radon is more likely to increase.

Regardless of any exception granted, radon testing after construction but before occupancy is required. If any result from the post-construction testing is at above the threshold (4.0 pCi/L) a passive radon system must be installed in the impacted area, and any area with test results above the action level must be retested after installation and the radon system adjusted (including conversion to an active system) until satisfactory results are obtained. Radon testing, mitigation, and laboratory work for developments to be funded with OHFA resources must be performed by individuals who meet the certification and licensure requirements as outlined in OAC 3701-69.

Testing

Professional Qualifications

Ohio Administrative Code, Chapter 3701-69 sets forth all requirements for qualification as a radon tester, mitigation specialist, or mitigation contractor, as well as standards of conduct for each type of qualified professional. Radon testing, mitigation, and laboratory work for developments to be funded with OHFA resources must be performed by individuals who meet the certification and licensure requirements as outlined in OAC 3701-69.

Testing Protocols

Radon testing must be performed according to **OAC 3701-69-07**, *Standards of conduct for radon testers*, as well as current testing protocols for the applicable building type. The current testing protocol for multifamily buildings is the ANSI/AARST “Protocol for Conducting Radon and Radon Decay Product Measurements in Multifamily Buildings (MAMF-2017)”, but the most current testing standard for the applicable building type, as of the date the testing occurs, should be followed.

Current testing protocols and standards can be found on the EPA’s Current Radon Standards of Practice webpage.

Additional Resources

EPA provides the following helpful resources for radon-resistant construction:

- Radon-Resistant Construction Basics and Techniques
- Builder and Contractor Resources for Radon-Resistant New Construction (RRNC)
- Building Codes and Standards for Radon-Resistant New Construction (RRNC)

The following are resources for radon mitigation systems in existing buildings:

- Radon Mitigation Standards for Multifamily Buildings (RMS-MF 2018)
- ASTM E2121 – 13: Standard Practice for Installing Radon Mitigation Systems in Existing Low-Rise Residential Buildings

Radon information for Ohio:

- Ohio – EPA Map of Radon Zones
- Ohio Department of Health – About Radon
- Geometric Mean Radon Concentrations by Zip Codes

F. Adaptability & Accessibility

Developments may be subject to one or more of the below laws, depending on the date of construction, type of space, funding sources utilized, and other project-specific information. The burden of compliance rests with the project team. In the application, during the construction process, and at project closeout owners/developers and/or architects will be required to certify compliance with applicable regulations.

Fair Housing Amendments Act of 1988 (FHA)

- Applicable to all new multi-family housing consisting of four or more dwelling units per building built for first occupancy after March 13, 1991.
- Applicant must state in the DCFF which safe harbor will be used to demonstrate compliance with the Act's design and construction requirements. The safe harbor for 504 is determined separately.

Americans with Disabilities Act (ADA), Title II and Title III

- Applicable to common areas open for public use, such as a property management or rental office. (note: Section 504 mobility and sensory requirements supersede)

Section 504 of the Rehabilitation Act of 1973 (Section 504)

- Section 504 applies to the entire project which includes all sites, all buildings, all residential units, all common areas, all site features and must have a single Section 504 safe harbor designated in the DCFF and 80% drawing documents submitted to OHFA.
- Applicable to recipients of federal financial assistance, however, OHFA requires that all developments receiving OHFA funding meet the accessibility requirements of Section 504. This includes, but is not limited to:
    - Providing 5% of the dwelling units (10% of units in Competitive Housing Tax Credit developments), or at least one unit, whichever is greater, as accessible for persons with mobility disabilities;
        - In the case of Competitive HTC developments, units beyond the 5% statutorily required mobility units may be "OHFA Flex Units" (see subsequent section)
        - To meet the 10% of units on Competitive HTC developments this is 5% rounded up + another 5% rounded up.
        - For example, if a Competitive HTC development has 65 units the statutorily required 5% is 4 units and a second set of 4 units is required that could be identified as 504 accessible units or OHFA Flex Units.
    - Providing an additional 2% of the dwelling units, or at least one unit, whichever is greater, as accessible for persons with hearing or visual disabilities;
    - Providing accessible units in a variety of unit configurations and distributed throughout the development and buildings; and

    - Ensuring accessible units have comparable features to non-accessible units, such as kitchen and bathroom storage.
    - Providing accessible site features and common areas including but not limited to dumpsters, outdoor grills, parking, play areas, and community shelters.
        - An accessible route to the dumpster is not required if the building includes an interior trash chute or trash room for residents, and residents are therefore not required to take their trash to a dumpster outside of the building.
- Applicant must state in the DCFF which standard will be used to demonstrate compliance with the requirements of Section 504 (Uniform Federal Accessibility Standards, 2010 ADA Standards, or an equivalent standard as defined in HUD's Deeming Notice). and a SINGLE section 504 safe harbor (Uniform Federal Accessibility Standards, 2010 ADA Standards, or substantially equivalent or greater access to and usability of the building as defined in HUD's Deeming Notice).

When more than one law and accessibility standard applies, it is currently necessary for the recipient to determine on a section-by-section basis which standard affords greater accessibility.

Additionally, all projects must to comply with the accessibility requirements as outlined in the **Ohio Building Code, Chapter 4101:1-11**, which includes the use of **ICC/ANSI A117.1-2009** for the design and construction of accessible units.

G. OHFA Flex Units

INTENT

OHFA recognizes that there are a variety of features that may provide additional accessibility that are not covered under current section 504 safe harbors. The inclusion of other features with OHFA Flex Units (OFU) allows for the opportunity to create housing that is best suited that the population it will be serving. Flex Units are in addition to the 5% of mobility units and 2% of sensory units required by Section 504. They MAY serve as substitution the additional 5% of accessible units required by the Competitive HTC program

The intent is to have spaces that provide improved accessibility for mobility or sensory that features that are not part of accessibility safe harbors selected by the project. Features proposed should address the needs for accessibility currently not addressed by 504 requirements this can include features mobility devices such as standing wheelchairs or power chairs. For example, this may include wheelchair maneuvering approach and fixture clearances but provide features and appliances not in the accessibility safe harbor selected for the project.

- OHFA Flex Units can only be used on units that are above the 5% mobility or 2% sensory units required by OHFA or federal funding sources.
- These extra units are not technically Section 504 units, so other options may be offered.
- All spaces for accessible path and space must meet the same project Section 504 safe harbor as the certified Section 504 units must.

All OHFA Flex Units are required to follow reasonable accommodation and modification Section 504 process to allow the units to be reasonably modified as needed at the owner expense.

Use of OHFA Flex Units must be submitted at application and will be part of the architectural review process. The purpose of the features must be clearly stated, and will be subject to discussion and acceptance with OHFA.

SUGGESTED ITEMS

OHFA's partners are encouraged to bring other ideas that allow greater accessibility that are not covered here. This is not an inclusive list. Below are examples that have been presented to OHFA in the past or discussed at accessibility seminars or trainings. Some of the following ideas are based upon requests denied previously by OHFA because they did not meet an accessibility standard but were thought to have merit.

Mobility:

- 48" step-in or roll-in showers in lieu of 60" showers in senior occupancies. This is a common request so shower grab bars are closer and more reachable for fall mitigation. Floor drain outside of shower would still be required.
- Accessible tub or Transfer showers in lieu of roll-in. Space for the roll-in must exist if a reasonable modification request is made and the room floor drain must also exist in the construction scope of work.
- Higher counter with roll under sinks for power wheel chairs.
- Cabinets and shelves in a different reach range to accommodate semi-ambulatory and standing mobility chairs where lower reach is more difficult. Pull out drawers would still be recommended as a universal feature to suit a wider range of mobility disabilities.
- Pull down closet rods
- Step-in tubs
- Step-in showers
- Doorways up to 42" wide
- Unit entry doorways with electronic opening device

SENSORY:

- Sensory Impaired thermostats (braille and talking thermostats may not meet green. This would have to be approved by OHFA potentially as a green exception if a comparable smart thermostat could not be found.
- Tactile surfaces within a unit to aid with visual impairment.
- High contrast floor, counter top and edge banding to aid those with visual acuity limitations.

H. Universal Design

As defined by the Center for Universal Design, Universal Design is the design of products and environments to be usable by all people, to the greatest extent possible, without the need for adaptation or specialized design. OHFA recognizes the need to create housing that includes Universal Design features while maintaining aesthetics and affordability.

Certain elements of Universal Design are required in all OHFA-funded HTC developments. A list of mandatory and optional Universal Design components can be found in Appendix B of these Standards, and in Appendix D of the 2023 QAP. Applicants will designate which components of Universal Design will be incorporated into the development in the DCFF. The architect will also be required to clearly identify the location of each component in the architectural drawings. Before issuance of Form 8609, the applicant will be required to provide documentation to OHFA evidencing the required number of units meet the Universal Design commitment made in the application.

I. Sustainability

In addition to meeting all energy efficiency requirements as stated in the Ohio Building Code or Residential Code, all multifamily developments must obtain one of the below energy efficiency or green building certifications. All HTC developments must obtain one of the listed green building certifications.

Evidence of final certification from a Home Energy Rating System (HERS) rater or the applicable green building rating system is required upon construction completion. At OHFA's discretion, exceptions may be granted for an otherwise qualified and licensed professional to verify compliance with these standards in projects unable to retain a HERS rater in their area.

Energy Efficiency Certification

- ENERGY STAR certification, buildings permitted prior to 1/1/2021:
  - ENERGY STAR Multifamily High Rise program (Performance Path or Prescriptive Path);
  - ENERGY STAR Certified Homes program; or
  - ENERGY STAR Multifamily New Construction program, National Version 1.

- ENERGY STAR certification, buildings permitted on or after 1/1/2021:
  - ENERGY STAR Multifamily New Construction program, National Version 1

Green Building Certification

Developments must utilize the most current version of the below certifications. The current version is the version applicable at the time of project application to the certifying body.

- Enterprise Green Communities
- Leadership in Energy & Environmental Design (LEED)- Silver Level Certification or higher
- ICC 700 National Green Building Standard (NGBS)- Silver Level Certification or higher

Requirements for Rehabilitation projects unable to obtain the above certifications

For projects that consist of rehabilitation and that are unable to meet the requirements to obtain one of the above energy efficiency or green building certifications, the project may use the OHFA Limited Scope Rehabilitation Sustainability Standards ("Limited Scope Standards" or "LSS") as an alternative to meeting OHFA's requirements for sustainability.

Use of a HERS rater is recommended for all Rehab projects using the LSS. For Competitive 9% HTC projects selecting this option, the following are required in addition to the above:

- Certification by a HERS rater of the following:
  - The development meets or exceeds the higher of either the Overlay criteria or the current Ohio adopted standard; and
  - The post-construction blower door test demonstrates 150% improvement over the pre-rehabilitation test, up to 12 ACH.

J. Minimum Rehabilitation Requirements

Any rehabilitation projects seeking HTC (competitive or non-competitive), must meet the definition of Substantial Rehabilitation as stated in the Definitions section of this document.

OHFA will utilize the Physical Capital Needs Assessment (PCNA), scope of work, and AHFA submitted by the applicant to verify the project meets the definition of Substantial Rehabilitation. Applicants must clearly identify the following in their application submission:

1. The components needing replacement.

2. The EUL/RUL of the identified components/subcomponents counting toward the substantial rehabilitation requirement; and
3. The page numbers of the PCNA that notes each identified major building system, components, and/or subcomponents as needing replacement (this is separate from the EUL/RUL).

OHFA may require the applicant to adjust the scope of work if the proposed scope of work does not meet the definition and requirements for Substantial Rehabilitation, or address all the items identified in the PCNA. The PCNA must conform to OHFA's standards. OHFA expects the final completed rehabilitation to appear complete with matching materials and finishes throughout and all systems to be in working order with new materials at 100% RUL and all existing materials at 50% RUL or greater..

K. Physical Capital Needs Assessment Standards

1. Purpose

A Physical Capital Needs Assessment (PCNA) represents a third-party qualified professional's opinion of a property's current overall physical condition and identifies significant deferred maintenance, existing deficiencies, and material building code violations that affect the property's use and its structural and mechanical integrity.

2. Qualifications:

PCNAs must be prepared by an individual who has experience in the preparation of PCNAs and possesses a professional qualification/license in architecture or engineering. If the individual does not have a professional qualification/license in architecture or engineering, they must have at least 5 years of experience preparing PCNAs.

The third-party qualified professional preparing the PCNA must not be connected in any way to the project, including serving as the design architect, project architect of record, general contractor, property manager or sponsor. OHFA may grant an exception for small projects and adaptive reuse projects.

3. Definitions

OHFA will use the following definitions per ASTM E2018-15.

Physical deficiency: a conspicuous defect or deferred maintenance of a subject property's material systems, components, or equipment as observed during completion of the PCNA. This definition specifically excludes deficiencies that may be remedied with routine maintenance, miscellaneous minor repairs, normal operating maintenance, etc., and excludes de minimis conditions that generally do not present material physical deficiencies of the subject property.

Deferred maintenance: physical deficiencies that could have been remedied with routine maintenance, normal operating maintenance, etc., excluding de minimis conditions that generally do not present a material physical deficiency to the subject property.

Good condition: in working condition and does not require immediate or short term repairs above an agreed threshold.

Fair condition: in working condition, but may require immediate or short term repairs above an agreed threshold.

Poor condition: not in working condition or requires immediate or short term repairs substantially above an agreed threshold.

Immediate costs: opinions of costs that require immediate action as a result of any of the following: (1) material existing or potentially unsafe conditions, (2) material building or fire code violations, or (3) physical

deficiencies that if left uncorrected would be expected to result in or contribute to critical element or system failure within one year or will result most probably in a significant escalation of its remedial cost.

Short-term costs: opinions of costs to remedy physical deficiencies, such as deferred maintenance, which may not warrant immediate attention, but require repairs or replacements that should be undertaken on a priority basis in addition to routine preventive maintenance.

4. Scope

OHFA requires a PCNA for all projects involving rehabilitation, including adaptive reuse projects. The PCNA must conform to ASTM E2018-15 standards and must reflect the current condition of the building. OHFA may require the third party qualified professional update any report that is greater than one year old at the time of submission. PCNAs produced for USDA or RAD projects may be used with OHFA approval of an Exception Request prior to submission.

The PCNA must identify any repair items that represent an immediate threat to health and safety, and all other significant defects, deficiencies, items of deferred maintenance, and material building code violations that would limit the expected useful life of major components or systems.

The PCNA must include a completed PCNA Table of Contents template (including page numbers) and all items specified in Appendix A: PCNA Table of Contents.

5. Process

The professional shall conduct a site visit and physical inspection of interior and exterior of units and structures, including:

- 25% of all dwelling units (if less than 50 total units)
- 20% of all dwelling units (if 50 to 99 total units)
- 15% of all dwelling units (if greater than 100 total units)
- All accessible units
- All common facilities
- All site improvements
    - All building exteriors

The units sampled must be comprehensive of all unit and building types.

The professional must interview available on-site property management and maintenance personnel and inquire about past repairs/improvements, pending repairs and existing or chronic physical deficiencies.

6. Guidance

The following are additional requirements.

- The PCNA should be a point-in-time observation of existing conditions at that time.
- The PCNA should not address or be catered to competitive scoring items.
- For Adaptive Reuse/Historic projects, the PCNA should make a point-in-time observation of all aspects of the building but give substantial detail on structure, façade and items to remain.
- When the age of a component is unknown, it should be stated as such. However, the condition must still be evaluated even if the age is an estimate or unknown.
- The EUL/RUL of an item does not equate to need. Need is the second half of evaluation for replacement that must be documented.
- Existing accessibility items should only be addressed in the PCNA if the owner requests it and the PCNA provider is adequately qualified to provide such an evaluation.
- The PCNA should not address any green building standards or certifications that the project may plan to seek.
- When evaluating a system or component, the following questions must be clearly answered in the PCNA:
    - What is the current condition?
    - Does it need to be replaced?
    - How much of the system needs to be replaced (as a percentage)?

- Major systems and its components should be documented through photographs specifically highlighting areas of concern.
- Indicate when relying on information from the owner ("the owner reports the new windows were installed in….").

L. Site and Exterior Requirements

The below requirements apply to all projects. However, rehabilitation and adaptive reuse projects may request exceptions to the following:

- Durable Materials - Exterior
- Main Entry
- Sidewalks
- Outdoor Recreational Features

These requirements are specific to OHFA. They are in addition to all other applicable local and state codes, including those governing accessibility.

1. Durable Materials – Exterior

1.1. The elements in this section are required to be constructed with the following:
  1.1.1. Materials that have a 30-year Expected Useful Life (EUL) or longer, as defined by the OHFA EUL table found in Appendix C;
  1.1.2. Materials that have a 30-year warranty that covers 75% or more of material replacement cost; or
  1.1.3. Any of the below pre-approved materials.

1.2. Materials that do not fall into any of the above categories must be approved by the OHFA architect.

1.3. Materials with a RUL of 50% or more or items in which the RUL of 50% as defined by the EUL table, may be replaced with OHFA's approval through the Exception Request process.

1.4. If a conflict between any of the required durable materials and a green certification requirement exists, the highest durability standard that is compatible with certification must prevail.

1.5. Pre-Approved Materials
  1.5.1. Exterior Walls
    1.5.1.1. Wood stud
    1.5.1.2. Brick or block
    1.5.1.3. Manufactured stone
    1.5.1.4. Metal stud framing
  1.5.2. Exterior Veneers
    1.5.2.1. Vinyl siding 0.042-0.055
    1.5.2.2. Portland cement stucco (EIFS prohibited)
    1.5.2.3. Fiber cement board
    1.5.2.4. Brick
    1.5.2.5. Thin stone
    1.5.2.6. Thin brick (Thin brick must be mud set and may not have a metal grid system. Thin brick systems must have 40 year+ warranty that matches OHFA EUL for brick veneer.)
    1.5.2.7. Laminated metal panels
  1.5.3. Roofing
    1.5.3.1. Preformed metal
    1.5.3.2. 30-year asphalt shingles
    1.5.3.3. 20-year membrane roof (EPDM, PVC, TPO)
  1.5.4. Insulation

1.5.4.1. Must meet ASHRAE 90.1-2012 (or current Ohio adopted standard)

1.5.5. Windows & Exterior Doors

1.5.5.1. New and replacement windows and exterior doors must be Energy Star rated for zone 5 and wind rated for 90mph or DP-20 minimum

1.5.5.2. Exterior doors must be insulated core

2. Community Integration

2.1. Developments should coordinate with or complement the local architecture and promote resident integration with the broader neighborhood. They should be culturally appropriate for the population being served and the community in which they are situated. Design should promote community safety to the greatest extent practicable.

2.2. Street networks and sidewalks that are internal to the development site should connect to municipal or surrounding streets and sidewalks wherever feasible.

3. Gutters and Downspouts

3.1. All downspouts must empty onto concrete splash blocks with a positive slope away from the building or be piped to an appropriate location, unless an alternative design is dictated by the local code.

4. Main Entry

4.1. All main entries must have a roof or awning over the entry area.

5. Parking

5.1. Where parking is provided, areas must be paved and graded for proper drainage as set forth in the HUD Minimum Property Standards.

6. Sidewalks

6.1. All sidewalks along the accessible route must be a minimum of 5-feet in width.

7. Dumpsters

7.1. Refuse collection stations must be screened with permanent enclosures.

7.2. Paved areas adjacent to the collection stations must be designed to provide adequate bearing for heavy garbage trucks.

8. Outdoor Recreational Features

8.1. All developments are encouraged to contain or be located in close proximity to play space, walking paths, or other recreational features and amenities appropriate to the population being served.

8.2. If provided, play areas for younger children must not be in isolated areas and must be located to maximize safety.

8.3. For single family dwellings, yard space must be maximized for outdoor activities/play areas. Sidewalks or other walkways must be located at the edge of the yard space to the extent feasible.

9. Retention/Detention Ponds

9.1. Retentions/detention ponds must be clearly marked with “No Trespassing” signs; forbidding trespassing, swimming, skating, fishing, or boating.

M. Interior Requirements

The below requirements apply to all projects. However, rehabilitation and adaptive reuse projects may request exceptions to the following:

- Durable Materials - Interior
- Major Building Components
- Common Areas
- Elevators
- Interior Doors
- Floor Coverings
- Unit Sizes
- Bedroom Sizes
- Bathrooms
- Kitchen & Appliances
- Laundry Facilities

These requirements are specific to OHFA. They are in addition to all other applicable local and state codes, including those governing accessibility.

1. Durable Materials – Interior

1.1. The elements in this section are required to be constructed with the following:
  1.1.1. Materials that have a 30-year Expected Useful Life (EUL) or longer, as defined by the OHFA EUL table found in Appendix C;
  1.1.2. Materials that have a 30-year warranty that covers 75% or more of material replacement cost; or
  1.1.3. Any of the below pre-approved materials.

1.2. Materials that do not fall into any of the above categories must be approved by the OHFA architect.

1.3. Materials with a RUL of 50% or more or items in which the RUL of 50%as defined by the EUL table, may be replaced with OHFA's approval through the Exception Request process.

1.4. If a conflict between any of the required durable materials and a green certification requirement exists, the highest durability standard that is compatible with certification must prevail.

1.5. Pre-Approved Materials
  1.5.1. Countertops
    1.5.1.1. Plastic laminate on moisture resistant, high-density fiberboard substrates
  1.5.2. Cabinets and Drawers
    1.5.2.1. Cabinet materials must be in accordance with the requirements of ANSI A161.1 "Minimum Construction Performance Standards for Kitchen Cabinets" and must also include:
      1.5.2.1.1. Solid wood doors/fronts
      1.5.2.1.2. Wood stile with plywood panel
      1.5.2.1.3. Plywood frame
  1.5.3. Residential Living Unit Floors
    1.5.3.1. Ceramic tile
    1.5.3.2. Wood
    1.5.3.3. Vinyl plank or tile
    1.5.3.4. Sheet vinyl
    1.5.3.5. Stained concrete
    1.5.3.6. Carpet, must be solution-dyed nylon with closed-cell and antimicrobial and water resistant backing. If a pad is required, a high-density pad with closed-cell and antimicrobial and water resistant material must be used.
  1.5.4. Drywall
    1.5.4.1. Moisture-resistant gypsum board ("paperless board") or equivalent must be used on all vertical and horizontal surfaces that are within four feet of any water sources where the drywall can be splashed, such as kitchen sink, next to water heater, and/or clothes washer.
    1.5.4.2. Water-resistant gypsum, when used on ceilings must be rated for the span.

2. Major Building System Subcomponents

2.1. Water Heaters

2.1.1. Must meet ASHRAE 90.1-2012 or current Ohio adopted standard.

2.2. HVAC systems

2.2.1. Must be Energy Star-rated and/or meet the specific energy efficiency requirements of the applicable green building certification.

2.2.2. Must meet ASHRAE 90.1-2012 or current Ohio adopted standard.

2.2.3. Package Terminal Air Conditioning (PTAC) units are permitted only in rehabilitation projects in which they currently exist. Sleeves must be replaced with composite nonconductive energy efficient type. PTAC ducts may not block controls or windows.

2.2.4. All affordable units must be air conditioned.

2.2.5. Stacked mechanical units, if used, must allow for the access, service, and replacement of one unit without the removal of another (for example, a furnace must be able to be repaired without the removal of an adjacent water heater).

2.3. Electrical components

2.3.1. All light bulbs must have a 10,000-hour minimum life.

2.3.2. Residential fixtures shall use common lamp base type fixtures such as A-19 or tube bi-pin. Bases such as GU24 and similar specialty bases are prohibited in residential areas and discouraged in multitenant buildings as well. LED lights are encouraged and required in all unheated areas.

2.3.3. Obsolete electrical panels must be replaced. This includes electrical panels that contain components that are not readily and commonly available at a reasonable cost. The PCNA must document panel size, make and manufacturer. Replacement panels must show load calculations with major load change such as HVAC.

2.3.4. In developments serving a family population, electrical outlets must be tamper resistant.

3. Common Areas

3.1. Community facilities such as offices, dining, mail pick-up, and other necessary functions must be situated where they can be easily found by the residents. Most of these facilities shall be centrally located in close proximity of the primary entrance.

3.2. The maximum common area, using the Common Space definition for what constitutes common area, must not exceed 20 percent of the total gross building square footage.

3.2.1. This requirement *does not apply* to single-family homes, 1, 2, or 3-family dwellings, and townhomes, if the common area space is exclusively for use of the individual resident.

3.2.2. This requirement *does not apply* to existing rental units, unless the footprint of the original building is expanded.

3.2.3. Developments serving seniors or a PSH population may submit an exception request to exceed 20 percent. Exception request should be based upon programmatic space needs.

3.3. Hallways must be a minimum of 42” in width (new construction only).

4. Elevators

4.1. All developments that exceed three stories must have an elevator accessible to all residents.

4.2. Developments serving seniors or a PSH population must not exceed one story unless the building has an elevator accessible to all residents. Exceptions for some PSH populations will be considered.

4.2.1. This requirement *does not apply* to single family homes, 1, 2, or 3-family dwellings, or townhouses.

5. Interior Doors

5.1. In projects involving new construction, interior doors must meet the following requirements:

5.1.1. Minimum 32” in width

5.1.2. Solid wood or solid core (ex: particle board core, foam core)

5.1.3. Lever-style handles are required on all doors with latches or locks .

5.2. In projects involving rehabilitation or adaptive reuse, interior doors must meet the following requirements:

5.2.1. Existing doors, if replaced, must be replaced with solid wood or solid core doors (ex: particle board core, foam core) or insulated steel.

Closet or pantry doors without latches or locks may have loop pulls or similar non graspable hardware. Roller catches do not constitute a latch or lock.

6. Floor Coverings

6.1. Floor coverings must be non-glare and slip resistant, and uniform in thickness and color throughout the entire room/space. Where intentional patterns or borders are included, then different colors are acceptable (for example flooring patterns selected to aid in navigation of senior developments).

6.2. Carpet is **only** permitted in the following development types and locations:

6.2.1. Management and social service office areas;

6.2.2. Bedrooms in residential living units (except for Service Enriched housing developments);

6.2.3. In senior developments, carpet is permitted in living/dining rooms only if a walk-off area is provided in front of any exterior/entry door.

7. Storage Space

7.1. All affordable units must include adequate storage space for unit residents. OHFA recognizes that adequacy will vary by population served and construction type.

7.2. Storage space in accessible units must be equivalent to storage space in non-accessible units.

8. Unit Sizes

8.1. All affordable units must meet the following minimum size requirements:

8.1.1. 0-bedroom/Efficiency units (i.e. studio, efficiency): 450 square feet

8.1.1.1. New Construction: 450 square feet

8.1.1.2. Rehabilitation: 450 square feet

8.1.1.3. Assisted Living: 350 square feet

8.1.2. 1-bedroom units:

8.1.2.1. New Construction: 550 square feet

8.1.2.2. Rehabilitation: 500 square feet

8.1.2.3. Service Enriched: 450 square feet

8.1.2.4. Assisted Living: 450 square feet, or all HTC 1-bedroom units combined must average 500 square feet

8.1.3. 2-bedroom units:

8.1.3.1. New Construction: 750 square feet

8.1.3.2. Rehabilitation: 700 square feet

8.1.4. 3-bedroom units: 950 square feet

8.1.5. 4+ bedroom units: 1,100 square feet

8.2. Single-room occupancy units (SROs) are not permitted.

8.3. Senior Developments may not have any unit larger than two bedrooms.

8.4. Single-family homes must contain three or more bedrooms.

8.5. OHFA reserves the right to limit the size of units during the application review process.

9. Bedroom Sizes

9.1. All affordable unit bedrooms must meet the following minimum size requirements:

9.1.1. Primary bedroom: 120 square feet

9.1.2. Secondary bedrooms: 100 square feet

9.2. OHFA encourages bedrooms on accessible floors wherever practical.

9.3. At a minimum, three- and four-bedroom affordable units must support double occupancy in each bedroom under local zoning and building requirements.

10. Bathrooms

10.1. For new construction only, affordable units must provide the following number of bathrooms based on unit size:
  10.1.1. 0-bedroom units: 1 full bathroom
  10.1.2. 1-bedroom units: 1 full bathroom
  10.1.3. 2-bedroom units: Either 1 full bathroom or more
  10.1.4. 3-bedroom units: Either 1.5 bathrooms or more
  10.1.5. 4+ bedroom units: 2 full bathrooms or more
10.2. All plumbing fixtures must have lever-style handles.
10.3. Any wall-hung sinks must have concealed floor and stud-braced carriers.
10.4. New construction multi-story townhomes must have an accessible bathroom or accessible half-bathroom on the accessible floor.
10.5. All 504 mobility units provided must have one roll-in shower.
  10.5.1. OHFA Flex Units may have roll-in showers, transfer showers, or accessible tubs with grab bars that are compliant with the project selected safe harbor.
10.6. Sink cabinets may be removable in accessible units. If removable cabinets are used, the flooring and walls underneath the cabinet must be finished.

11. Kitchen & Appliances

11.1. All affordable unit kitchens must include:
  11.1.1. Either a stand-alone range that is at least 30-inches wide or a cooktop and wall oven;
  11.1.2. An Energy Star-certified refrigerator (under-counter refrigerators will not be accepted);
  11.1.3. An Energy-Star certified dishwasher (if provided); and
  11.1.4. Plumbing fixtures with lever-style handles.
11.2. All kitchen appliances that are replaced or installed must be new.
11.3. Kitchens in accessible units must have at least a 12” x 15” appliance-free counter-space adjacent to all appliances.
11.4. Sink cabinets may be removable in accessible units. If removable cabinets are used, the flooring and walls underneath the cabinet must be finished.
11.5. Kitchens in accessible units must have a work surface that does not exceed 34” in height, including the stove/cooktop.
11.6. Assisted Living units must be hard wired for a stove and located such that adding it does not require modification to the countertop or cabinet layout. A hood must be provided. Stove must be installed and made available at owner expense if requested by the resident and if doing so would not pose a health or safety risk to the requesting resident.

12. Laundry Facilities

12.1. All affordable units must include washer and dryer hookup unless laundry facilities are provided on-site.
  12.1.1. This requirement *does not apply* to Service Enriched, Assisted Living, or 0-bedroom units.
12.2. All clothes washers and clothes dryers provided by the property owner must be Energy Star certified, excluding common area laundry facilities.

N. Architectural Submission and Review Process

Submissions and Correspondence

All communications related to the architectural review, including submission of architectural plans, must be sent to arch@ohiohome.org. State the project name as it appears in the AHFA/GFA and OHFA tracking number in the subject line, and carbon copy the project’s development analyst on the email. If documents are too large to be sent via email, they must be submitted on a compact disc. **OHFA is not able to accept**

submissions through any of the following: external file transfer protocol (FTP) sites, Dropbox, Box, Google Drive, or OneDrive.

All drawings and specifications must be prepared under direct supervision of an Ohio Licensed (active and current) Architect in accordance with the Architectural Practice Act, bear the license number of the architect, and if the architect is part of any business structure other than a sole proprietorship, he or she must include the Project Design Firm registration number on the drawings. The drawings are required to be signed and sealed by the design architect ("Architect of Record").

Review Process

It is recommended that OHFA staff be involved in the design concept at the earliest stage possible to provide guidance through the review process.

Applicants must receive design approval from OHFA before proceeding with any element of construction or rehabilitation. OHFA will review plans for conformity to the requirements contained herein which include but are not limited to appropriateness for occupancy served, functionality, life safety, durability, quality of life, and scope of work. The development must not change, convert, modify, reconfigure, or otherwise alter the number of bedrooms and the size of those bedrooms without prior written approval from OHFA.

OHFA may complete a joint architectural review with any other governmental entity involved in the project, including but not limited to USDA, HUD, SHPO, and local governments.

Decisions made by the OHFA Staff Architect may be appealed to the Director of Multifamily Housing in writing. Appeals must be specific and, where appropriate, cite to the governing regulation that conflicts with the Staff Architect decision.

Required Documents - Preliminary Architectural Submission

At minimum, the proposal application architectural submission must include all of the following:

- The Design and Construction Features Form (DCFF), including Construction Certification, completed, signed and submitted as a pdf.
- Exception Request form(s), if applicable.
- Preliminary drawings, which must include all of the following:
    - Cover sheet with name of development, development address, development team, drawing index, code information, and table indicating unit schedule (including accessible, adaptable and sensory impaired units), types and sizes;
    - Site plan, including parking data and layouts;
    - Landscape plan;
    - Dimensioned floor plans with room designations and proposed finishes;
    - Exterior elevations with material notations;
    - Typical wall sections (new construction only); and
    - Schematic Drawings and/or specifications for HVAC, plumbing, and electrical or similar items included in the scope of work.

Preliminary drawings, described above, must be submitted in all of the following formats:

- Electronic format (pdf)
    - Single PDF file for all drawings specified above.
    - Separate PDF for specifications.
- Hard copy
    - Full set of architectural plans, 11"x17" scaled to fit. **Full-size architectural plans will be rejected.**

Upon request only, preliminary drawings must be submitted in DXF R-14 format or DWG AutoCAD R-14 format.

Required Documents - Final Architectural Submission

Final applications must include 80 percent complete permit sets, including final plans for all trades. Unless approved by OHFA, the plans must include the project name as submitted with the proposal application and OHFA tracking number. The submission must show conformity to the preliminary submittal, including the information included within the Design and Construction Features Form.

At minimum, the final application architectural submission must include all of the following:

- The DCFF included/incorporated into the front of the 80% plan sets. The DCFF must include:
    - Updated information, if needed, from the proposal application submission, matching the information in the 80% plans;
    - The signed Construction Certification pages;
    - Completed verifications, as applicable, that the drawings comply with any and all accessibility, energy efficiency, universal design, and/or green building requirements required for the development or committed to in the application for funding.
- Asbestos, mold, lead-based paint considerations as required.
- Items required to be completed per Phase I or II Environmental Site Assessment, or per applicable Environmental Review performed by OHFA.
- Plan sets, which must include all of the following:
    - Site plans
    - Interior and Exterior elevations
    - Dimensioned floor plans
    - Wall sections (if applicable)
    - Structure (if applicable)
    - Finishes
    - Details
    - Mechanical plans
        - Drawings must have a dimensioned plumbing plan and control points located for rough-in site verification. All pipes-through-floor and the walls they are intended to be located within must be dimensioned relative to the foundation where they must align with walls and/or islands above.
        - OHFA strongly encourages a surveyor to locate wall and through-slab pipe penetrations. Foundation over dig must be filled with insulation or forms and then back filled.

Plan sets, described above, must be submitted in <u>all</u> of the following formats:

- <u>Electronic format (pdf)</u>
    - Single PDF files for drawings including all site plans, dimensioned floor plans, elevations, wall sections, structure, finishes, details and mechanical plans.
    - Separate PDF file for specifications.
- <u>Electronic format (AutoCAD)</u>
    - Dimensioned floor plans only, submitted in DXF or DWG AutoCAD R-14 format.
        - It is preferred that the project architect's polyline area lines be included.
        - If drawings are externally referenced (xref), submissions must be bound (xbind) prior to creating files for OHFA.
        - Proprietary authorship information such as title blocks, Architecture seals, etc. should be removed.

        - DXF should be generated from the base file and not a plan sheet file.
- Hard copy
    - Full set of architectural plans, 11”x17" scaled to fit. **Full-size architectural plans will be rejected.**

O. Monitoring & Compliance

Construction Monitoring

The OHFA Project Administration team ensures that construction progresses according to schedule and that the recipient fulfills all terms of the funding agreements and related policies. Staff will conduct periodic site visits during construction to provide technical assistance, verify that the project is on schedule to meet required deadlines, and to ensure requirements of the various funding sources are being met.

For projects utilizing HDAP funds, staff will also review construction costs, progress, third-party inspection reports and change orders as part of each request for funds. OHFA may request copies of change orders if additional information is needed to verify project costs or to verify that commitments made by the recipient during the application process will still be met.

Additionally, for all OHFA projects, OHFA requires the submission of any change orders for any Major Building Components that do not have a substantially similar material or solution.

Examples of change orders that should be submitted included but or not limited to: 1) durability of materials, 2) Changes in or removal of features, e.g. fences, pools, community rooms/buildings, accessibility features, 3) loss or moving of units between buildings, 4) changes in programmatic space, 5) substantial changes in costs including, cost changes of 20% or greater, use of contingency 10% or greater, cost savings of $10,000 or more, and value engineering.

The development must notify OHFA of any substantial changes in plans, scope, or materials that are contemplated after submitting 80 percent plans and throughout construction of the project. This includes any damages, fires, or environmental issues that adversely impact the project, project completion or occupancy. Notifications must be made through the existing **constructionmonitoring@ohiohome.org** mailbox. When a change order is submitted it should include the related G702 and G703.OHFA staff will provide a response within two weeks.

OHFA will consider requests related to significant supply chain shortages that are either protracted or it is unclear when it will be resolved. These requests must include supporting documentation that clearly identify what materials there are a shortage of, impacted features, and what materials will be used in place. Any materials substituted should meet the durability requirements of the EUL tables, and if they do not meet this, additional discussion during the review of the request will be required. It is at OHFA’s discretion if the exception is in materials is long-term or for initial construction only, where upon replacement, materials that are fully compliant with the DAS requirements must be used.

Notification of Construction Start

Projects must notify OHFA when construction begins and should invite an OHFA Project Administration Staff to any pre-construction meetings, if held. Regular communication with the Project Administration team ensures that projects meet all the necessary requirements and are completed on time.

Quarterly Construction Monitoring Reports

All developments utilizing HTC or HDAP funds are required to complete the OHFA Quarterly Construction Monitoring Report (the Report), available on the OHFA Project Administration webpage. The Report must be submitted quarterly beginning the first quarterly reporting period following either OHFA Board approval or actual construction start, whichever is earlier. Reports are due January 1, April 1, July 1, and October 1 of each year until the project is placed into service. OHFA reserves the right to suspend disbursement of funds if the Report is not submitted.

Additional Documentation required for HOME and NHTF

Starting with 2021 awards, all HOME and NHTF awards must complete documentation to comply with Section 3 requirements. Documentation at minimum includes identifying the total hours, Section 3 hours, and Section 3 targeted hours for all contractor employees working on the project on the Monthly Section 3 Utilization Report, identification of if the contractor has Section 3 business concern status, and to the greatest extent feasible meet or exceed the following benchmark goals.

1. Section 3 workers are 25% or more of the total number of labor hours worked by all workers on a Section 3 project.
2. Targeted Section 3 workers are 5% or more of the total number of labor hours worked by all workers on a Section 3 project

Please note that contractors also have to submit Section 3 Worker Status Certification forms (for each worker) and a Contractor Workforce Section 3 Certification form to OHFA with the first Monthly Section 3 Utilization Report. Review Policy 21-04 for details on compliance including when the benchmarks aren't met to complete "Qualitative efforts".

For additional details on all Section 3 requirements review the Ohio Department of Development resource page. All Section 3 submissions to OHFA can be attached to the OHFA Quarterly Construction Monitoring Form. Contact your Project Administration Analyst with any questions.

Construction Completion

OHFA Project Administration staff will conduct a construction closeout visit once construction is substantially complete to verify all required and committed components have been constructed and that the development meets life safety requirements.

In addition, the following documents are required to be submitted to OHFA with the request for HDAP project closeout and/or issuance of Form 8609:

- Certificate(s) of Occupancy (or Final Inspection from the governing jurisdiction, if applicable);
- AIA G704 Certificate of Substantial Completion;
- Evidence of final certification from Energy Star, Enterprise Green Communities, LEED, or NGBS;
- Verification that architectural/design requirements that were committed to as part of the Competitive HTC process, such as Exceptional Development criteria, exercise and wellness features, aging in place components, or universal design components, have been completed; and
- Verification that any unresolved site-specific mitigations as specified in the project's environmental review clearance letter from OHFA have been completed (HDAP and 811 only).

Project closeout and issuance of Form 8609 will not occur until the above have been submitted and reviewed by OHFA and any remaining issues have been resolved.

APPENDIX A: EXCEPTION REQUESTS

New Construction

All items in the Site and Exterior Requirements and Interior Requirements sections are **required** for developments involving new construction. Requests for exceptions may only be submitted for the following:

- Items that are subject to non-OHFA (such as local codes or design standards, funding source, etc.) requirements that may conflict with these Standards; or
- Items that are unable to be complied with for a compelling reason, as fully described by the applicant in the Exception Request form.

Exception requests will be reviewed on a case-by-case basis and must include supporting documentation to justify the request. As noted in the Exceptions section, The OHFA staff architect will review requests and make a recommendation to the management team to accept, deny, or modify the exception. A final determination will be made by OHFA by the date indicated in the program calendars.

Supply Chain Delays

OHFA will consider exception requests related to significant supply chain shortages that are either protracted or it is unclear when it will be resolved. These requests must include supporting documentation that clearly identify what materials there are a shortage of, impacted features, and what materials will be used in place. Any materials substituted should meet the durability requirements of the EUL tables, and if they do not meet this, additional discussion during the review of the request will be required. It is at OHFA's discretion if the exception is in materials is long-term or for initial construction only, where upon replacement, materials that are fully compliant with the DAS requirements must be used.

Rehabilitation and Adaptive Reuse

Projects involving rehabilitation or adaptive reuse may seek an exception to certain requirements in the Site and Exterior Requirements and Interior Requirements sections as noted below if able to evidence that incorporating a specific element is infeasible. The exception request must include adequate supporting documentation to demonstrate how incorporation of the element is infeasible.

- Durable Materials - Exterior
- Main Entry
- Sidewalks
- Outdoor Recreational Features
- Durable Materials - Interior
- Major Building Components
- Common Areas
- Elevators
- Interior Doors
- Floor Coverings
- Unit Sizes
- Bedroom Sizes
- Bathrooms
- Kitchen & Appliances
- Laundry Facilities

Rehabilitation and adaptive reuse projects may also request exceptions to the following:

- Universal Design mandatory components (if seeking competitive points through the Competitive HTC program)
- Items with 75% or more RUL (if replacement required for green certification)
- Accessibility requirements (if compliance is technically infeasible)

Historic Preservation

If a project's development budget includes federal and/or state historic tax credits, the applicant is not required to submit an Exception Request form for approval in advance of the proposal application.

The Exception Request form must still be completed only to identify those areas in which the project cannot meet OHFA's requirements. The form must be submitted with the proposal application, physically attached to the

preliminary plans. OHFA will work with the State Historic Preservation Office (SHPO) to ensure those OHFA requirements that can be met, will be met.

Submission Requirements

Applicants will be required to submit the request using the OHFA Exception Request form found on the OHFA website and must provide supporting documentation as necessary to justify the request. All exception requests must include concise supporting documentation such as an applicable section of code, site plan, floor plan, etc. as is applicable.

Deadlines

Applicants must reference the applicable program guidelines to determine when exception requests are due. All requests for design exceptions are due prior to the applicable application deadline, *with the exception of the following which may be submitted with the application*:

- Developments utilizing federal or state historic tax credits; or
- Developments applying for 4% tax credits only (non-BGF); or
- Existing multifamily rental rehabilitation developments seeking an exception to minimum unit size and/or minimum bedroom size requirements.

In the above cases, the Exception Request form for these items must still be completed but must be submitted with the application instead of in advance, physically attached to the preliminary plans.

APPENDIX B: UNIVERSAL DESIGN COMPONENTS

All HTC developments must incorporate all mandatory components (marked with a check) in all units, as well as the specified number of additional components.

Entry

- ✓ 36”-wide (minimum) entry door with lever-style handle (mandatory for NC only)
- ✓ Minimum 5’ x 5’ level clear space inside and outside entry door
- ✓ Adequate non-glare lighting at walkways, accessible routes, and exterior spaces
- ✓ Adequate lighting both inside and outside the building and unit entrance
- ✓ High visibility address numbers (both building and exterior units)
- ✓ Overhead weather protection at entrances (mandatory for NC only)
- ☐ Built-in shelf/bench/ledge located outside the door
- ☐ Nonslip surfaces on walkways and entryways
- ☐ Primary unit entry with an accessible/dual peephole and backlit doorbell
- ☐ Door locks that are easy to operate, such as keyless locks with remote control or keypad
- ☐ No-step entry (1/2” or less threshold) at main entrance

Interior Stairs and Hallways

- ✓ Adequate lighting to illuminate all stairway(s), landings, and hallway(s)
- ✓ Hallways with a minimum width of 42”
- ✓ Anti-slip strips on front edge of steps in color-contrast material
- ☐ Color contrast between stair treads and risers
- ☐ Handrails on both sides of interior stairs

Interior Doors

- ✓ 34”-wide (minimum) doors leading to habitable room, allowing for a 32” minimum clearance
- ✓ Lever-style door hardware on all interior doors
- ✓ Interior maximum door threshold of ¼ inch beveled or flush
- ☐ Pocket doors with easy-to-grip handles

Faucets

- ✓ Anti-scald faucets with lever handle for all sinks, bathtubs, and showers
- ✓ Pressure balanced faucets

Electrical

- ✓ Thermostat and control panels that are easy to read and simple to operate
- ✓ Rocker, touch light, or hands-free switches
- ✓ Extra electrical outlets (for medical equipment or rechargeable items, etc.) placed 18″ to 24″ above finished floor (bedroom only)
- ☐ Lighted switches visible in the dark
- ☐ Switched outlets for lamps, etc. to be turned on with wall switch
- ☐ Electrical outlets, phone jacks, and data ports at least 18” above finished floor
- ☐ Light switches between 44”-48” above finished floor; thermostats no more than 48” above finished floor
- ☐ Clear access space of 30” by 48” in front of switches, outlets, and controls
- ☐ Audible and visual alarms for smoke/fire/carbon monoxide in all code-required accessible areas and all units

Bathrooms

- ✓ Countertops with beveled/radiused corners. Outside corners are suggested to be a two-inch corner radius, waterfall edge with one-inch radius, or two-inch chamfer.
- ✓ Adjustable-height showerhead or hand-held showerhead with flexible hose and easily operable controls
- ✓ Non-glare lighting at vanities
- ☐ A full- or half-bath on the main floor with clear floor space of 30" x 48"
- ☐ Overhead light fixture in tub/shower
- ☐ Mirror(s) placed for both standing and sitting, such as a full-length or tilting mirror
- ☐ Toilet centered at least 18" from any side wall, tub, or cabinet
- ☐ In at least one bathroom per unit:
    - Low-threshold or curbless shower at least 5' x 3' OR ADA bathtub with seat
    - Clear knee space (at least 27" high) under sink. May be open knee space or achieved by means of removable vanity or fold-back or self-storing doors. Pipe protection panels must be provided to prevent contact with hot or sharp surfaces.
    - Grab bars, or wall-blocking for future installation of grab bars, in tub/shower, and toilet. Grab bars must be properly anchored and supported.

Kitchen

- ✓ At least 15" clear space/"landing zone" on each side of stove and sink, and at least one side of refrigerator. This is countertop clear space and may be shared with another appliance and/or required work surface if applicable.
- ✓ Loop handles on drawers and cabinets
- ✓ Non-glare task lighting to illuminate sink, stove, and work areas
- ☐ Adjustable height shelves in wall cabinets
- ☐ Base cabinets with pull out drawers
- ☐ Pull-out work surface near the oven, refrigerator and/or microwave.
- ☐ Visual contrast at front edge of countertop or between the countertop and the cabinets
- ☐ Side-by-side refrigerator-freezer
- ☐ Cooktop/range with front or side-mounted controls (senior units only)
- ☐ Extra outlets for small appliances, electronics, etc.
- ☐ Clear knee space (at least 27" high) under sink, counters, and/or cook tops. If under sink, pipes must have protection and may not be in the required knee space. May be open knee space or achieved by means of removable base cabinets or fold-back or self-storing doors.

Closets/Storage

- ☐ Area is well-lit with a switch located outside the space
- ☐ Doors and handles that are easy to operate. No bi-fold or accordion-type doors.
- ☐ Adjustable-height shelving and/or closet rods OR clothes rods installed at multiple heights
- ☐ Pull out-shelves, rollout cabinets, and other easy to access storage components

APPENDIX B: OHFA PCNA Table of Contents

This PCNA Table of Contents template must be used in all PCNAs submitted to OHFA. All items in the TOC must be included in the PCNA. If an item is not applicable, it must be stated as such.

*if any. Please notate with corresponding numbers listed in the EUL Table. Include **both**:* • *The item's Estimated Useful Life (based on the OHFA EUL table) and Remaining Useful Life; and* • *The item's current physical condition, stated as "good", "fair", or "poor".* *This list should not be considered all-inclusive. Conversely, some items may not be applicable to the subject property and should be noted as such.*	
4. Document Reviews and Interviews	
Identify any material information relating to physical deficiencies of the subject property resulting from the review of documents and interviews conducted.	
5. Additional Considerations	
Identify any material additional considerations or out of scope considerations that are included in the PCNA. This may include: • Capital improvements, enhancements, or upgrades to building components, systems, or finishes; and/or • Improvements, capital expenditures, repairs, maintenance and other activities that are or may be required at a future date, except as needed in the review of short term and long term needs; and/or • Environmental considerations, such as mold, asbestos, or lead-based paint.	
6. Opinions of Costs	
6.1 Identification of material physical deficiencies and suggested remedies, including opinions of costs.	
For each material physical deficiency, the consultant should provide a suggested remedy, which may include recommending further research or testing, or both, if appropriate in the consultant's opinion.	
Opinions of costs should be provided for material physical deficiencies and not for repairs or improvements that could be classified as: (1) cosmetic or decorative; (2) part or parcel of a building renovation program (3) tenant improvements/finishes; (4) enhancements to reposition the subject property in the marketplace; (5) for warranty transfer purposes; or (6) routine or normal preventive maintenance, or a combination thereof.	
Identify all Immediate Repairs as occurring in year zero and project the expected reserve requirements necessary for at least the following 20 years of operations.	
6.1(a) Immediate Costs (table)	
Identify each material physical deficiency, suggested remedy, and opinion of cost.	
6.1(b) Short-term Costs (table)	
Identify each material physical deficiency, suggested remedy, and opinion of cost.	
6.1(c) Replacement Reserves/Ongoing Physical Needs (table)	
Provide opinion of cost for all long-term capital expenses. Long-term capital expenses are typically based on the expected useful life of the building systems and components.	
6.1(d) Costs for Additional Study	

Provide the opinions of costs for additional study for any physical deficiencies that warrant further study/research or design, testing, exploratory probing, and exploration of various repair schemes, or a combination thereof, in order to determine the appropriate suggested remedy or scope.	
7. Qualifications	
Provide the qualifications for the professionals contributing to and completing the PCNA.	
8. Limiting Conditions	
Provide all limiting conditions of the PCNA.	
9. Exhibits	
9.1 Representative photographs	
9.2 Pre-survey questionnaire	
9.3 User/owner submitted documents	
9.4 Photocopied plot plans, sketches, etc.	
9.5 Inspected units list (unit number, size, accessibility)	
9.6 Other exhibits considered appropriate by the consultant	

APPENDIX C: OHFA EUL TABLE

System Description	Overall General Description	Comp.	Sub-Comp.	Description (Systems are Labeled as SYSTEM and marked in Navy Blue, Items in Denim Blue are items for General Description)	Family	Senior
3.1				Overall General Description		
3.2				SYSTEM: SITE		
	3.2.1			Topography		
	3.2.2			Storm Water Drainage		
		3.2.2.1		Catch basins, inlets, culverts	50	50
		3.2.2.2		Marine or stormwater bulkhead	35	35
		3.2.2.3		Earthwork, swales, drainways, erosion controls	50	50
		3.2.2.4		Storm drain lines	50	50
		3.2.2.5		Stormwater management ponds	50	50
		3.2.2.6		Fountains, pond aerators	15	15
	3.2.3			Access and Egress		
		3.2.3.1		Security gate - lift arm	10	10
		3.2.3.2		Security gate - rolling gate	15	15
	3.2.4			Paving, Curbing and Parking		
		3.2.4.1		Asphalt Pavement	25	25
		3.2.4.2		Asphalt Seal Coat	5	5
		3.2.4.3		Concrete Pavement	50	50
		3.2.4.4		Curbing, Asphalt	25	25
		3.2.4.5		Curbing, Concrete	50	50
		3.2.4.6		Parking, Gravel Surfaced	15	15
		3.2.4.7		Permeable Paving Systems (brick, concrete pavers)	30	30
		3.2.4.8		Striping and Marking	15	15
		3.2.4.9		Signage, Roadway / Parking	15	15
		3.2.4.10		Carports, wood frame	30	30
		3.2.4.11		Carports, metal frame	40	40
	3.2.5			Flatwork (walks, plazas, terraces, patios)		
		3.2.5.1		Asphalt	25	25
		3.2.5.2		Concrete	50	50
		3.2.5.3		Gravel	15	15
		3.2.5.4		Permeable Paving (brick, concrete pavers)	30	30
	3.2.6			Landscaping and Appurtenances		
		3.2.6.1		Fencing, chain-link	40	40
		3.2.6.2		Fencing, wood picket	15	20
		3.2.6.3		Fencing, wood board (=>1"x 6")	20	25
		3.2.6.4		Fencing, wrought Iron	60	60
		3.2.6.5		Fencing, steel or aluminum	20	25
		3.2.6.6		Fencing, concrete Masonry unit (CMU)	30	30
		3.2.6.7		Fencing, PVC	15	20

		3.2.6.8		Signage, Entrance/Monument	25	25
		3.2.6.9		Mail Kiosk	15	20
		3.2.6.10		Retaining Walls, heavy block (50-80 lb)	60	60
		3.2.6.11		Retaining Walls, re-inforced concrete masonry unit (CMU)	40	40
		3.2.6.12		Retaining Walls, treated timber	25	25
		3.2.6.13		Storage sheds	30	30
	3.2.7			**Recreational Facilities**		
		3.2.7.1		Sport Court- asphalt	25	25
		3.2.7.2		Sport Court- synthetic	15	20
		3.2.7.3		Sport Court-hardwood	50	50
		3.2.7.4		Tot Lot (playground equipment)	10	15
		3.2.7.5		Tot Lot- loose ground cover	3	5
		3.2.7.6		Pool Deck	15	15
		3.2.7.7		Pool/Spa Plastic Liner	8	8
		3.2.7.8		Pool/Spa pumps and equipment	10	10
		3.2.7.9		Decks-treated lumber	20	20
		3.2.7.10		Decks-composite	50	50
	3.2.8			**Site Utilities**		
		3.2.8.1		**Site Utilities-Water**		
			3.2.8.1.1	Water Mains/Valves	50	50
			3.2.8.1.2	Water Tower	50	50
			3.2.8.1.3	Irrigation System	25	25
		3.2.8.2		**Site Utilities-Electric**		
			3.2.8.2.1	Electric distribution center	40	40
			3.2.8.2.2	Electric distribution lines	40	40
			3.2.8.2.3	Transformer	30	30
			3.2.8.2.4	Emergency Generator	25	25
			3.2.8.2.5	Solar Photovoltaic panels	15	15
			3.2.8.2.6	Photovoltaic Inverters	10	10
			3.2.8.2.7	Pole mounted lights	25	25
			3.2.8.2.8	Ground lighting	10	10
			3.2.8.2.9	Building Mounted Lighting	10	10
			3.2.8.2.10	Building Mounted High Intensity Discharge (HID) Lighting	10	20
		3.2.8.3		**Site Utilities-Gas**		
			3.2.8.3.1	Gas Main	40	40
			3.2.8.3.2	Gas Supply Lines	40	40
			3.2.8.3.3	Site Propane, Storage & Distribution	35	35
			3.2.8.3.4	Gas lights/fire pits	20	20
		3.2.8.4		**Site Utilities-Sewer**		
			3.2.8.4.1	Sanitary Sewer lines	50	50
			3.2.8.4.2	Sanitary waste treatment system	40	40
			3.2.8.4.3	Lift Station	50	50
		3.2.8.5		**Site Utilities-Trash**		

			3.2.8.5.1	Dumpsters	15	15
			3.2.8.5.2	Compactors (exterior, commercial grade)	20	20
			3.2.8.5.3	Recycling containers/equipment	15	15
			3.2.8.5.4	Composting, organic recycling equipment	10	10
3.3				**SYSTEM: BUILDING FRAME AND ENVELOPE**		
	3.3.1			**Foundation**		
		3.3.1.1		Slab, reinforced concrete	100	100
		3.3.1.2		Slab, post tensioned	100	100
		3.3.1.3		Continuous reinforced concrete footer and CMU stem wall	100	100
		3.3.1.4		Piers, reinforced concrete footer and CMU pier	100	100
		3.3.1.5		Piers, treated timber post/pole	40	40
		3.3.1.6		Foundation Waterproofing	40	40
		3.3.1.7		Foundation suction, drainage, moisture or radon gas controls/alarms	10	10
	3.3.2			**Building Frame**		
		3.3.2.1		**Framing System, Floors & Walls**		
			3.3.2.1.1	Wood, timbers, dimensioned lumber, laminated beams, trusses	100	100
			3.3.2.1.2	Tie downs, clips, braces, straps, hangers, shear walls/panels	75	75
			3.3.2.1.3	Steel, beams, trusses	100	100
			3.3.2.1.4	Reinforced concrete	100	100
			3.3.2.1.5	Reinforced masonry, concrete masonry units (CMUs)	100	100
			3.3.2.1.6	Solid Masonry (obsolete)	100	100
		3.3.2.2		**Crawl Spaces, Envelope Penetrations**		
			3.3.2.2.1	Sealed crawl space system	40	40
			3.3.2.2.2	Vents, screens, covers	30	30
			3.3.2.2.3	Vapor Barrier (VDR) ground or underfloor	30	30
			3.3.2.2.4	Penetrations, caulking/sealing	15	15
			3.3.2.2.5	Crawl space, (de)pressurization, fans, pumps, radon gas alarms	10	10
		3.3.2.3		**Roof Frame & Sheathing**		
			3.3.2.3.1	Wood frame and board or plywood sheathing	75	75
			3.3.2.3.2	Tie downs, clips, braces, straps, hangers	75	75
			3.3.2.3.3	Steel frame and sheet metal or insulated panel sheathing	100	100
			3.3.2.3.4	Reinforced concrete deck	100	100
		3.3.2.4		**Flashing & Moisture Protection**		
			3.3.2.4.1	Caulking and Sealing	15	15
			3.3.2.4.2	Concrete/Masonry Sealants	10	10
			3.3.2.4.3	Wood waterproofing and sealants	10	10
			3.3.2.4.4	Building wraps & moisture resistant barriers	50	50
			3.3.2.4.5	Paints and stains, exterior	8	8
		3.3.2.5		**Attics & Eaves**		
			3.3.2.5.1	Screened gable end or soffit Vents	30	30
			3.3.2.5.2	Roof vents, passive	40	40

			3.3.2.5.3	Roof Vents, powered	20	20
		3.2.2.6		**Insulation**		
			3.3.2.6.1	Loose fill, fibre glass, cellulose, mineral wool	50	50
			3.3.2.6.2	Batts, blankets, rolls, fibre glass or mineral wool	60	60
			3.3.2.6.3	Rigid foam board	60	60
			3.3.2.6.4	Sprayed foam	60	60
		3.3.2.7		**Exterior Stairs, Rails, Balconies/Porches, Canopies**		
			3.3.2.7.1	Exterior Stairs, wood frame/stringer	30	30
			3.3.2.7.2	Exterior Stair Tread-wood	15	15
			3.3.2.7.3	Exterior Stairs-steel frame/stringer	40	40
			3.3.2.7.4	Exterior Stair Tread-metal, concrete filled	20	20
			3.3.2.7.5	Exterior Stairs, Concrete	50	50
			3.3.2.7.6	Fire escapes, metal	50	50
			3.3.2.7.7	Balcony/Porch, wood frame	25	25
			3.3.2.7.8	Balcony/Porch, steel frame or concrete	40	40
			3.3.2.7.9	Balcony/Porch, wood decking	20	20
			3.3.2.7.10	Balcony/Porch, composite decking	50	50
			3.3.2.7.11	Railings, wood	20	20
			3.3.2.7.12	Railings, metal	50	50
			3.3.2.7.13	Railings, composite	50	50
			3.3.2.7.14	Canopy, Concrete	50	50
			3.3.2.7.15	Canopy, Wood/Metal	40	40
		3.3.2.8		**Exterior Doors & Entry Systems**		
			3.3.2.8.1	Unit Entry Door, Exterior, solid wood/metal clad	25	30
			3.3.2.8.2	Common Exterior Door, aluminum and glass	30	30
			3.3.2.8.3	Common Exterior Door, solid wood /metal clad	25	25
			3.3.2.8.4	Storm/Screen Doors	5	10
			3.3.2.8.5	Sliding Glass Doors	25	30
			3.3.2.8.6	French or Atrium Doors, wood/metal clad	25	30
			3.3.2.8.7	Automatic Entry Doors	30	30
			3.3.2.8.8	Commercial Entry Systems	50	50
			3.3.2.8.9	Overhead Door	30	30
			3.3.2.8.10	Automatic Opener, overhead door	20	20
	3.3.3			**Façades or Curtainwall**		
		3.3.3.1		**Sidewall System**		
			3.3.3.1.1	Aluminum Siding	40	40
			3.3.3.1.2	Vinyl Siding	25	25
			3.3.3.1.3	Cement Board Siding	45	45
			3.3.3.1.4	Plywood/Laminated Panels	20	20
			3.3.3.1.5	Exterior Insulation Finishing System (EIFS)	30	30
			3.3.3.1.6	Stucco, over wire mesh/lath	50	50
			3.3.3.1.7	Metal/Glass Curtain Wall	40	40
			3.3.3.1.8	Precast Concrete Panel (tilt-up)	60	60

			3.3.3.1.9	Brick/block veneer	60	60
			3.3.3.1.10	Stone Veneer	50	50
			3.3.3.1.11	Glass Block	50	50
			3.3.3.1.12	Cedar/Redwood shakes, clapboard	50	50
			3.3.3.1.13	Pine board, clapboard	50	50
		3.3.3.2		**Windows**		
			3.3.3.2.1	Wood, (dbl, sgl hung, casement, awning, sliders)	35	45
			3.3.3.2.2	Wood, fixed pane, picture	40	45
			3.3.3.2.3	Aluminum	35	40
			3.3.3.2.4	Vinyl	30	30
			3.3.3.2.5	Vinyl/Alum Clad Wood	50	50
			3.3.3.2.6	Storm/Screen Windows	7	15
	3.3.4			Roofing and Roof Drainage		
		3.3.4.1		**Sloped Roofs**		
			3.3.4.1.1	Asphalt Shingle	20	20
			3.3.4.1.2	Metal	50	50
			3.3.4.1.3	Slate shingle	75	75
			3.3.4.1.4	Clay/cementitious barrel tile	60	60
			3.3.4.1.5	Wood Shingle, Cedar Shakes/Shingles	25	25
		3.3.4.2		**Low Slope/Flat Roofs**		
			3.3.4.2.1	Low slope-Built-up Roof, with gravel finish	20	20
			3.3.4.2.2	Low slope-Built-up Roof, no mineral or gravel finish	10	10
			3.3.4.2.3	Low slope-Adhered rubber membrane, (EPDM)	15	15
			3.3.4.2.4	Low slope-Thermoplastic membrane, (TPO, vinyl)	15	15
			3.3.4.2.5	Low slope-Rubberized/elastomeric white/cool roof	15	15
		3.3.4.3		**Roof Drainage, Trim & Accessories**		
			3.3.4.3.1	Gutters/Downspouts, aluminum	20	20
			3.3.4.3.2	Gutters/Downspouts, copper	50	50
			3.3.4.3.3	Low slope-roof drains, scuppers	30	30
			3.3.4.3.4	Soffits, Wood, Vinyl, Metal	20	20
			3.3.4.3.5	Fascia, Wood, Vinyl	20	20
			3.3.4.3.6	Roof Hatch	30	30
			3.3.4.3.7	Service Door	30	30
			3.3.4.3.8	Roof Skylight	30	30
3.4				SYSTEM: Mechanical. Electric-Plumbing		
	3.4.1			Plumbing		
		3.4.1.1		**Water Supply and Waste Piping**		
			3.4.1.1.1	PVC/CPVC pipe, supply and waste	75	75
			3.4.1.1.2	Copper/brass hard pipe, supply	75	75
			3.4.1.1.3	Copper Tube, supply	50	50
			3.4.1.1.4	Galvanized pipe, supply	40	40
			3.4.1.1.5	Cast iron sanitary waste	75	75
			3.4.1.1.6	Domestic Cold Water Pumps	20	20

			3.4.1.1.7	Sewage Ejectors	50	50
			3.4.1.1.8	Commercial Sump Pump	20	20
			3.4.1.1.9	Residential Sump Pump	15	15
			3.4.1.1.10	Water Softener/Filtration	15	15
		3.4.1.2		**Domestic Water Heating**		
			3.4.1.2.1	DHW circulating pumps	15	15
			3.4.1.2.2	DHW storage tanks	15	15
			3.4.1.2.3	Exchanger, in tank or boiler	15	15
			3.4.1.2.4	External tankless heater, gas or electric	20	20
			3.4.1.2.5	Solar hot water	20	20
			3.4.1.2.6	Residential hot water heater, gas or electric	12	15
			3.4.1.2.7	Flue, gas water heaters	35	35
		3.4.1.3		**Fixtures**		
			3.4.1.3.1	Faucets & valves	15	20
			3.4.1.3.2	Bath tubs & sinks, cast iron	75	75
			3.4.1.3.3	Bubs tubs & sinks, enameled or stainless steel, fiberglass	40	40
			3.4.1.3.4	Bath tubs & sinks, porcelain	50	50
			3.4.1.3.5	Toilets/bidets/urinals	40	40
			3.4.1.3.6	Flush valves	10	15
			3.4.1.3.7	Tub/shower units or integrated assemblies	30	30
	3.4.2			Centralized HVAC Systems		
		3.4.2.1		**Centralized Heating/Cooling Equipment**		
			3.4.2.1.1	Boilers, Oil Fired, Sectional	25	25
			3.4.2.1.2	Boilers, Gas/Dual Fuel, Sectional	25	25
			3.4.2.1.3	Boilers, Gas/Dual Fuel, Low MBH	30	30
			3.4.2.1.4	Boilers, Gas/Dual Fuel, High MBH	40	40
			3.4.2.1.5	Boilers, Gas Fired Atmospheric	25	25
			3.4.2.1.6	Boilers, Electric	20	20
			3.4.2.1.7	Boiler Blowdown and Water Treatment	25	25
			3.4.2.1.8	Boiler Room Pipe Insulation	25	25
			3.4.2.1.9	Boiler Room Piping	50	50
			3.4.2.1.10	Boiler Room Valves	25	25
			3.4.2.1.11	Boiler Temperature Controls	15	15
			3.4.2.1.12	Heat Exchanger	35	35
			3.4.2.1.13	Combustion Air, Duct with Fixed Louvers	30	30
			3.4.2.1.14	Combustion Air, Motor Louvers and Duct	25	25
			3.4.2.1.15	Combustion Waste Flue	40	40
			3.4.2.1.16	Cooling tower	25	25
			3.4.2.1.17	Chilling plant	20	20
			3.4.2.1.18	Steam supply station	50	50
			3.4.2.1.19	Free standing chimney	50	50
		3.4.2.2		**Centralized Heat/Air/Fuel Distribution**		
			3.4.2.2.1	Fuel oil/propane storage tanks	40	40

			3.4.2.2.2	Remediate/remove abandoned tanks/fuel lines	100	100
			3.4.2.2.3	Fuel transfer system	25	25
			3.4.2.2.4	Gas/oil distribution lines	50	50
			3.4.2.2.5	Gas meter	40	40
			3.4.2.2.6	2 pipe/4 pipe hydronic distribution-above grade	50	50
			3.4.2.2.7	2 pipe/4 pipe hydronic distribution-in ground	25	25
			3.4.2.2.8	Hydronic/Water Circulating Pumps	20	20
			3.4.2.2.9	Hydronic/Water Controller	20	20
			3.4.2.2.10	Radiation-steam/hydronic (baseboard or freestanding radiator)	50	50
			3.4.2.2.11	Fan Coil Unit, Hydronic	30	30
			3.4.2.2.12	Central exhaust fans/blowers	20	20
	3.4.3			**Decentralized and Split HVAC Systems**		
		3.4.3.1		**Dwelling/Common Area HVAC Equipment**		
			3.4.3.1.1	Electric heat pump, condenser, pad or rooftop	15	15
			3.4.3.1.2	Electric AC condenser, pad or rooftop	15	15
			3.4.3.1.3	Electric furnace/air handler	20	20
			3.4.3.1.4	Gas furnace/air handler	20	20
			3.4.3.1.5	Hydronic heat/electric AC air handler	25	25
			3.4.3.1.6	Hydronic feed electric heat pump/air handler	25	25
			3.4.3.1.7	Wall mounted electric/gas heater	25	25
			3.4.3.1.8	Electric baseboard heater	30	30
			3.4.3.1.9	PTAC Thruwall (packaged terminal air conditioning)	15	15
			3.4.3.1.10	Window or thru-wall air conditioners	10	10
			3.4.3.1.11	Package HVAC roof top	15	15
			3.4.3.1.12	Air filtration/humidity control devices (humidifiers, HRV's)	20	20
			3.4.3.1.13	Duct, rigid sheet metal, insulated if not in conditioned space	35	35
			3.4.3.1.14	Duct, flexible, insulated	20	20
			3.4.3.1.15	Duct, sealing-mastic or UL 181A or 181B tape.	20	20
			3.4.3.1.16	Diffusers, registers	20	20
			3.4.3.1.17	Fireplace, masonry & firebrick, masonry chimney	75	75
			3.4.3.1.18	Fireplace, factory assembled	35	35
			3.4.3.1.19	Fireplace insert, stove	50	50
			3.4.3.1.20	Chimneys, metal, and chimney covers	35	35
		3.4.3.2		**HVAC Controls**		
			3.4.3.2.1	Dwelling/common area thermostat	15	20
			3.4.3.2.2	Heat sensors	15	15
			3.4.3.2.3	Outdoor temperature sensor	10	10
	3.4.4			**Electrical**		
		3.4.4.1		**Electric Service & Metering**		
			3.4.4.1.1	Building service panel	50	50
			3.4.4.1.2	Building meter	40	40
			3.4.4.1.3	Tenant meters, meter panel	40	40

		3.4.4.2		**Electrical Distribution**		
			3.4.4.2.1	Tenant electrical panel	50	50
			3.4.4.2.2	Unit/building wiring	50	50
		3.4.4.3		**Electric Lighting & Fixtures**		
			3.4.4.3.1	Switches & outlets	35	35
			3.4.4.3.2	Lighting - exterior entry	15	20
			3.4.4.3.3	Lighting- interior common space	25	30
			3.4.4.3.4	Lighting - Tenant Spaces	20	25
			3.4.4.3.5	Door bells, chimes	20	25
		3.4.4.4		**Telecommunications Equipment**		
			3.4.4.4.1	Satellite dishes/antennae	20	20
			3.4.4.4.2	Telecom panels & controls	20	20
			3.4.4.4.3	Telecom cabling & outlets	20	20
3.5				**SYSTEM: Vertical Transportation**		
	3.5.1			**Elevators/Escalators**		
		3.5.1.1		Electrical switchgear	50	50
		3.5.1.2		Electrical wiring	30	30
		3.5.1.3		Elevator controller, call, dispatch, emergency	10	20
		3.5.1.4		Elevator cab, interior finish	10	20
		3.5.1.5		Elevator cab, frame	35	50
		3.5.1.6		Elevator, machinery	20	30
		3.5.1.7		Elevator, shaftway doors	10	20
		3.5.1.8		Elevator, shaftway hoist rails, cables, traveling	20	25
		3.5.1.9		Elevator, shaftway hydraulic piston and leveling	20	25
		3.5.1.10		Escalators	50	50
3.6				**SYSTEM: Life Safety/Fire Protection**		
	3.6.1			**Sprinklers and Standpipes**		
		3.6.1.1		Building fire supression sprinklers, standpipes	50	50
		3.6.1.2		Fire pumps	20	20
		3.6.1.3		Fire hose stations	50	50
		3.6.1.4		Fire extinguishers	10	15
	3.6.2			**Alarm, Security & Emergency Systems**		
		3.6.2.1		Tenant space alarm systems	10	15
		3.6.2.2		Residential smoke detectors	5	7
		3.6.2.3		Call station	10	15
		3.6.2.4		Emergency/auxillary generator	25	25
		3.6.2.5		Emergency/auxillary fuel storage tank	25	25
		3.6.2.6		Emergency lights, illuminated signs	5	10
		3.6.2.7		Smoke and fire detection system, central panel	15	15
		3.6.2.8		Buzzer/intercom, central panel	20	20
		3.6.2.9		Tenant buzzer / intercom /secured entry system	20	20
	3.6.3			**Other Systems**		
		3.6.3.1		Pneumatic Lines and Controls	30	30

		3.6.3.2		Auto-securing doors/entries/lock down	30	30
3.7				**SYSTEM: Interior Elements**		
	3.7.1			**Interiors-Common Areas**		
		3.7.1.1		**Finished walls, ceilings, floors**		
			3.7.1.1.1	Drywall	35	40
			3.7.1.1.2	Plaster	50	50
			3.7.1.1.3	Paints, stains, clear finishes, interior	15	20
			3.7.1.1.4	Wallpapers	15	20
			3.7.1.1.5	Wall tile, ceramic, glass, natural stone	35	50
			3.7.1.1.6	Floor tile, ceramic, natural stone	40	50
			3.7.1.1.7	Concrete/Masonry/Terrazo	75	75
			3.7.1.1.8	Hardwood floor (3/4" strip or parquet)	50	50
			3.7.1.1.9	Wood floor, laminated/veneered	20	25
			3.7.1.1.10	Resilient tile or sheet floor (vinyl, linoleum)	15	20
			3.7.1.1.11	Carpet	6	10
			3.7.1.1.12	Acoustic tile/drop ceiling	15	20
		3.7.1.2		**Millwork (doors, trim, cabinets, tops)**		
			3.7.1.2.1	Interior, hollow core doors	20	25
			3.7.1.2.2	Interior doors, solid core, wood, metal clad, fire rated	30	35
			3.7.1.2.3	Door trim	20	30
			3.7.1.2.4	Wall trim (base, chair rail, crown moldings)	30	35
			3.7.1.2.5	Passage & lock sets	15	20
			3.7.1.2.6	Bifold & sliding doors	15	20
			3.7.1.2.7	Cabinets & vanities	20	25
			3.7.1.2.8	Tops, granite, natural stone, engineered stone	50	50
			3.7.1.2.9	Tops, solid surface, stainless steel	40	50
			3.7.1.2.10	Tops, plastic laminates, wood	15	25
			3.7.1.2.11	Vanity tops, cultured marble, molded arcylic, fiberglass	25	35
		3.7.1.3		**Appliances**		
			3.7.1.3.1	Refrigerator/freezer	15	15
			3.7.1.3.2	Range, cook top, wall oven	20	25
			3.7.1.3.3	Range hood	20	25
			3.7.1.3.4	Microwave	10	10
			3.7.1.3.5	Disposal (food waste)	7	10
			3.7.1.3.6	Compactors (interior, residential grade)	7	10
			3.7.1.3.7	Dishwasher	10	15
			3.7.1.3.8	Clothes washer/dryer	10	15
		3.7.1.4		**Specialties**		
			3.7.1.4.1	Interior Mail Facility	20	25
			3.7.1.4.2	Common area bath accessories	7	12
			3.7.1.4.3	Mirrors & medicine cabinets	20	25
			3.7.1.4.4	Closet/storage specialties, shelving	20	25
			3.7.1.4.5	Common area interior stairs	50	50

			3.7.1.4.6	Common area railings	15	25
			3.7.1.4.7	Bath/kitchen vent/exhaust fans	15	15
			3.7.1.4.8	Ceiling fans	15	15
			3.7.1.4.9	Window treatments, drapery rods, shades, blinds, etc	15	25
			3.7.1.4.10	Indoor recreation and fitness equipment	10	15
			3.7.1.4.11	Entertainment centers, theatre projection and seating	15	25
	3.7.2			Interiors-Dwelling Units		
		3.7.2.1		**Finished walls, ceilings, floors**		
			3.7.2.1.1	Drywall	35	40
			3.7.2.1.2	Plaster	50	50
			3.7.2.1.3	Paints, stains, clear finishes, interior	10	15
			3.7.2.1.4	Wallpapers	10	15
			3.7.2.1.5	Wall tile, ceramic, glass, natural stone	30	40
			3.7.2.1.6	Floor tile, ceramic, natural stone	40	50
			3.7.2.1.7	Concrete/Masonry/Terrazzo	75	75
			3.7.2.1.8	Hardwood floor (3/4" strip or parquet)	50	50
			3.7.2.1.9	Wood floor, laminated/veneered	15	20
			3.7.2.1.10	Resilient tile or sheet floor (vinyl, linoleum)	15	20
			3.7.2.1.11	Carpet	6	10
			3.7.2.1.12	Acoustic tile/drop ceiling	15	20
		3.7.2.2		**Millwork (doors, trim, cabinets, tops)**		
			3.7.2.2.1	Interior, hollow core doors	20	25
			3.7.2.2.2	Interior doors, solid core, wood, metal clad	30	35
			3.7.2.2.3	Door trim	20	30
			3.7.2.2.4	Wall trim (base, chair rail, crown moldings)	25	35
			3.7.2.2.5	Passage & lock sets	12	20
			3.7.2.2.6	Bifold & sliding doors	12	20
			3.7.2.2.7	Cabinets & vanities	20	25
			3.7.2.2.8	Tops, granite, natural stone, engineered stone	50	50
			3.7.2.2.9	Tops, solid surface, stainless steel	40	50
			3.7.2.2.10	Tops, plastic laminates, wood	15	25
			3.7.2.2.11	Vanity tops, cultured marble, molded acrylic, fiberglass	25	35
		3.7.2.3		**Appliances**		
			3.7.2.3.1	Refrigerator/freezer	12	15
			3.7.2.3.2	Range, cook top, wall oven	15	25
			3.7.2.3.3	Range hood	15	25
			3.7.2.3.4	Microwave	10	10
			3.7.2.3.5	Disposal (food waste)	7	10
			3.7.2.3.6	Compactors (interior, residential grade)	7	10
			3.7.2.3.7	Dishwasher	10	15
			3.7.2.3.8	Clothes washer/dryer	10	15
		3.7.2.4		**Specialties**		

			3.7.2.4.1	Bath accessories (towel bars, grab bars, etc)	7	12
			3.7.2.4.2	Mirrors & medicine cabinets	15	25
			3.7.2.4.3	Closet/storage specialties, shelving	15	25
			3.7.2.4.4	Interior stairs	50	50
			3.7.2.4.5	Stair and loft railings	20	25
			3.7.2.4.6	Bath/kitchen vent/exhaust fans	15	15
			3.7.2.4.7	Ceiling fans	10	15
			3.7.2.4.8	Window treatments, drapery rods, shades, blinds, etc	10	20
				Additional Considerations		
4.1				**Environmental Measures (not elsewhere defined)**		
	4.1.1			Radon mitigation system periodic tests	5	5
	4.1.2			Environmental remediation system periodic tests	5	5
	4.1.3			Environmental remediation alarms	5	5
	4.1.4			Environmental remediation pumps & equipment	5	5
	4.1.5			Mold-treat-remediate (see other items for paint, drywall, etc.)	100	100
4.2				**Lead based paint, asbestos remediation**		
	4.2.1			Testing	100	100
	4.2.2			Lead based paint encapsulation	10	10
	4.2.3			Lead based paint (remove)	100	100
	4.2.4			Asbestos (remove)	100	100
4.3				**Commercial Tenant Improvements**		
	4.3.1			Owner provided item(s) (specify)	5	5
	4.3.2			Owner provided $ allowance (specify)	5	5

APPENDIX D: HOME PROPERTY STANDARDS

In addition to the Standards outlined in the DAS, for all projects receiving HOME funds the following provisions will be applicable as per 24 CFR § 92.251.

§ 92.251 Property standards.

(a) *New construction projects.*

(1) ***State and local codes, ordinances, and zoning requirements.*** Housing that is newly constructed with HOME funds must meet all applicable State and local codes, ordinances, and zoning requirements. HOME-assisted new construction projects must meet State or local residential and building codes, as applicable or, in the absence of a State or local building code, the International Residential Code or International Building Code (as applicable to the type of housing) of the International Code Council. The housing must meet the applicable requirements upon project completion.

(2) ***HUD requirements.*** All new construction projects must also meet the requirements described in this paragraph:

(i) ***Accessibility.*** The housing must meet the accessibility requirements of 24 CFR part 8, which implements Section 504 of the Rehabilitation Act of 1973 (29 U.S.C. 794), and Titles II and III of the Americans with Disabilities Act (42 U.S.C. 12131-12189) implemented at 28 CFR parts 35 and 36, as applicable. Covered multifamily dwellings, as defined at 24 CFR 100.201, must also meet the design and construction requirements at 24 CFR 100.205, which implements the Fair Housing Act (42 U.S.C. 3601-3619).

(ii) [Reserved]

(iii) ***Disaster mitigation.*** Where relevant, the housing must be constructed to mitigate the impact of potential disasters (e.g., earthquakes, hurricanes, flooding, and wildfires), in accordance with State and local codes, ordinances, or other State and local requirements, or such other requirements as HUD may establish.

(iv) ***Written cost estimates, construction contracts and construction documents.*** The participating jurisdiction must ensure the construction contract(s) and construction documents describe the work to be undertaken in adequate detail so that inspections can be conducted. The participating jurisdiction must review and approve written cost estimates for construction and determining that costs are reasonable.

(v) ***Construction progress inspections.*** The participating jurisdiction must conduct progress and final inspections of construction to ensure that work is done in accordance with the applicable codes, the construction contract, and construction documents.

(vi) ***Broadband infrastructure.*** For new commitments made after January 19, 2017 for a new construction housing project of a building with more than 4 rental units, the construction must include installation of broadband infrastructure, as this term is defined in 24 CFR 5.100, except where the participating jurisdiction determines and, in accordance with § 92.508(a)(3)(iv), documents the determination that:

(A) The location of the new construction makes installation of broadband infrastructure infeasible; or

(B) The cost of installing the infrastructure would result in a fundamental alteration in the nature of its program or activity or in an undue financial burden.

(b) ***Rehabilitation projects.*** All rehabilitation that is performed using HOME funds must meet the requirements of this paragraph (b).

(1) ***Rehabilitation standards.*** The participating jurisdiction must establish rehabilitation standards for all HOME-assisted housing rehabilitation activities that set forth the requirements that the housing must meet upon project completion. The participating jurisdiction's description of its standards must be in sufficient detail to determine the required rehabilitation work including methods and materials. The standards may refer to applicable codes or they may establish requirements that exceed the minimum requirements of the codes. The rehabilitation standards must address each of the following:

(i) ***Health and safety.*** The participating jurisdiction's standards must identify life-threatening deficiencies that must be addressed immediately if the housing is occupied.

(ii) ***Major systems.*** Major systems are: structural support; roofing; cladding and weatherproofing (e.g., windows, doors, siding, gutters); plumbing; electrical; and heating, ventilation, and air conditioning. For rental housing, the participating jurisdiction's standards must require the participating jurisdiction to estimate (based on age and condition) the remaining useful life of these systems, upon project completion of each major systems. For multifamily housing projects of 26 units or more, the participating jurisdiction's standards must require the participating jurisdiction to determine the useful life of major systems through a capital needs assessment of the project. For rental housing, if the remaining useful life of one or more major system is less than the applicable period of affordability, the participating jurisdiction's standards must require the participating jurisdiction to ensure that a replacement reserve is established and monthly payments are made to the reserve that are adequate to repair or replace the systems as needed. For homeownership housing, the participating jurisdiction's standards must require, upon project completion, each of the major systems to have a remaining useful life for a minimum of 5 years or for such longer period specified by the participating jurisdiction, or the major systems must be rehabilitated or replaced as part of the rehabilitation work.

(iii) ***Lead-based paint.*** The participating jurisdiction's standards must require the housing to meet the lead-based paint requirements at 24 CFR part 35.

(iv) ***Accessibility.*** The participating jurisdiction's standards must require the housing to meet the accessibility requirements in 24 CFR part 8, which implements Section 504 of the Rehabilitation Act of 1973 (29 U.S.C. 794), and Titles II and III of the Americans with Disabilities Act (42 U.S.C. 12131-12189) implemented at 28 CFR parts 35 and 36, as applicable. Covered multifamily dwellings, as defined at 24 CFR 100.201, must also meet the design and construction requirements at 24 CFR 100.205, which implements the Fair Housing Act (42 U.S.C. 3601-3619). Rehabilitation may include improvements that are not required by regulation or statute that permit use by a person with disabilities.

(v) [Reserved]

(vi) ***Disaster mitigation.*** Where relevant, the participating jurisdiction's standards must require the housing to be improved to mitigate the impact of potential disasters (e.g., earthquake, hurricanes, flooding, and wildfires) in accordance with State and local codes, ordinances, and requirements.

(vii) ***State and local codes, ordinances, and zoning requirements.*** The participating jurisdiction's standards must require the housing to meet all applicable State and local codes, ordinances, and requirements or, in the absence of a State or local building code, the International Existing Building Code of the International Code Council.

(viii) ***Uniform Physical Condition Standards.*** The standards of the participating jurisdiction must be such that, upon completion, the HOME-assisted project and units will be decent, safe, sanitary, and in good repair as described in 24 CFR 5.703. HUD will establish the minimum deficiencies that must be corrected under the participating jurisdiction's rehabilitation standards based on inspectable items and inspected areas from HUD-prescribed physical inspection procedures (Uniform Physical Conditions Standards) pursuant to 24 CFR 5.705.

(ix) ***Capital Needs Assessments.*** For multifamily rental housing projects of 26 or more total units, the participating jurisdiction must determine all work that will be performed in the rehabilitation of the housing and the long-term physical needs of the project through a capital needs assessment of the project.

(x) ***Broadband infrastructure.*** For new commitments made after January 19, 2017 for a substantial rehabilitation project of a building with more than 4 rental units, any substantial rehabilitation, as defined in 24 CFR 5.100, must provide for installation of broadband infrastructure, as this term is also defined in 24 CFR 5.100, except where the participating jurisdiction determines and, in accordance with § 92.508(a)(3)(iv), documents the determination that:

(A) The location of the substantial rehabilitation makes installation of broadband infrastructure infeasible;

(B) The cost of installing broadband infrastructure would result in a fundamental alteration in the nature of its program or activity or in an undue financial burden; or

(C) The structure of the housing to be substantially rehabilitated makes installation of broadband infrastructure infeasible.

(2) ***Construction documents and cost estimates.*** The participating jurisdiction must ensure that the work to be undertaken will meet the participating jurisdiction's rehabilitation standards. The construction documents (i.e., written scope of work to be performed) must be in sufficient detail to establish the basis for a uniform inspection of

the housing to determine compliance with the participating jurisdiction's standards. The participating jurisdiction must review and approve a written cost estimate for rehabilitation after determining that costs are reasonable.

(3) ***Frequency of inspections.*** The participating jurisdiction must conduct an initial property inspection to identify the deficiencies that must be addressed. The participating jurisdiction must conduct progress and final inspections to determine that work was done in accordance with work write-ups.

(c) *Acquisition of standard housing.*

(1) Existing housing that is acquired with HOME assistance for rental housing, and that was newly constructed or rehabilitated less than 12 months before the date of commitment of HOME funds, must meet the property standards of paragraph (a) or paragraph (b) of this section, as applicable, of this section for new construction and rehabilitation projects. The participating jurisdiction must document this compliance based upon a review of approved building plans and Certificates of Occupancy, and an inspection that is conducted no earlier than 90 days before the commitment of HOME assistance.

(2) All other existing housing that is acquired with HOME assistance for rental housing must meet the rehabilitation property standards requirements of paragraph (b) of this section. The participating jurisdiction must document this compliance based upon an inspection that is conducted no earlier than 90 days before the commitment of HOME assistance. If the property does not meet these standards, HOME funds cannot be used to acquire the property unless it is rehabilitated to meet the standards of paragraph (b) of this section.

(3) Existing housing that is acquired for homeownership (e.g., down payment assistance) must be decent, safe, sanitary, and in good repair. The participating jurisdiction must establish standards to determine that the housing is decent, safe, sanitary, and in good repair. At minimum, the standards must provide that the housing meets all applicable State and local housing quality standards and code requirements and the housing does not contain the specific deficiencies proscribed by HUD based on the applicable inspectable items and inspected areas in HUD-prescribed physical inspection procedures (Uniform Physical Condition Standards) issued pursuant to 24 CFR 5.705. The participating jurisdiction must inspect the housing and document this compliance based upon an inspection that is conducted no earlier than 90 days before the commitment of HOME assistance. If the housing does not meet these standards, the housing must be rehabilitated to meet the standards of this paragraph (c)(3) or it cannot be acquired with HOME funds.

(d) ***Occupied housing by tenants receiving HOME tenant-based rental assistance.*** All housing occupied by tenants receiving HOME tenant-based rental assistance must meet the standards in 24 CFR 982.401, or the successor requirements as established by HUD.

(e) ***Manufactured housing.*** Construction of all manufactured housing including manufactured housing that replaces an existing substandard unit under the definition of “reconstruction” must meet the Manufactured Home Construction and Safety Standards codified at 24 CFR part 3280. These standards preempt State and local codes which are not identical to the federal standards for the new construction of manufactured housing. Participating jurisdictions providing HOME funds to assist manufactured housing units must comply with applicable State and local laws or codes. In the absence of such laws or codes, the installation must comply with the manufacturer's written instructions for installation of manufactured housing units. All new manufactured housing and all manufactured housing that replaces an existing substandard unit under the definition of “reconstruction” must be on a permanent foundation that meets the requirements for foundation systems as set forth in 24 CFR 203.43f(c)(i). All new manufactured housing and all manufactured housing that replaces an existing substandard unit under the definition of “reconstruction” must, at the time of project completion, be connected to permanent utility hook-ups and be located on land that is owned by the manufactured housing unit owner or land for which the manufactured housing owner has a lease for a period at least equal to the applicable period of affordability. In HOME-funded rehabilitation of existing manufactured housing the foundation and anchoring must meet all applicable State and local codes, ordinances, and requirements or in the absence of local or state codes, the Model Manufactured Home Installation Standards at 24 CFR part 3285. Manufactured housing that is rehabilitated using HOME funds must meet the property standards requirements in paragraph (b) of this section, as applicable. The participating jurisdiction must document this compliance in accordance with inspection procedures that the participating jurisdiction has established pursuant to § 92.251, as applicable.

(f) *Ongoing property condition standards: Rental housing.*

(1) Ongoing property standards. The participating jurisdiction must establish property standards for rental housing (including manufactured housing) that apply throughout the affordability period. The standards must ensure that owners maintain the housing as decent, safe, and sanitary housing in good repair. The participating jurisdiction's description of its property standards must be in sufficient detail to establish the basis for a uniform inspection of HOME rental projects. The participating jurisdiction's ongoing property standards must address each of the following:

(i) ***Compliance with State and local codes, ordinances, and requirements.*** The participating jurisdiction's standards must require the housing to meet all applicable State and local code requirements and ordinances. In the absence of existing applicable State or local code requirements and ordinances, at a minimum, the participating jurisdiction's ongoing property standards must include all inspectable items and inspectable areas specified by HUD based on the HUD physical inspection procedures (Uniform Physical Condition Standards (UPCS)) prescribed by HUD pursuant to 24 CFR 5.705. The participating jurisdiction's property standards are not required to use any scoring, item weight, or level of criticality used in UPCS.

(ii) ***Health and safety.*** The participating jurisdiction's standards must require the housing to be free of all health and safety defects. The standards must identify life-threatening deficiencies that the owner must immediately correct and the time frames for addressing these deficiencies.

(iii) ***Lead-based paint.*** The participating jurisdiction's standards must require the housing to meet the lead-based paint requirements in 24 CFR part 35.

(2) Projects to which HOME funds were committed before January 24, 2015 must meet all applicable State or local housing quality standards or code requirements, and if there are no such standard or code requirements, the housing must meet the housing quality standards in 24 CFR 982.401.

(3) ***Inspections.*** The participating jurisdiction must undertake ongoing property inspections, in accordance with § 92.504(d).

(4) ***Corrective and remedial actions.*** The participating jurisdiction must have procedures for ensuring that timely corrective and remedial actions are taken by the project owner to address identified deficiencies.

(5) ***Inspection procedures.*** The participating jurisdiction must establish written inspection procedures inspections. The procedures must include detailed inspection checklists, description of how and by whom inspections will be carried out, and procedures for training and certifying qualified inspectors. The procedures must also describe how frequently the property will be inspected, consistent with this section, § 92.209, and § 92.504(d).

APPENDIX E: NHTF PROPERTY STANDARDS

In addition to the Standards outlined in the DAS, for all projects receiving NHTF funds the following provisions will be applicable as per 24 CFR § 93.301.

§ 93.301 Property standards.

(a) *New construction projects.*

(1) State and local codes, ordinances, and zoning requirements. Housing that is newly constructed with HTF funds must meet all applicable State and local codes, ordinances, and zoning requirements. HTF-assisted new construction projects must meet State or local residential and building codes, as applicable or, in the absence of a State or local building code, the International Residential Code or International Building Code (as applicable to the type of housing) of the International Code Council. The housing must meet the applicable requirements upon project completion.

(2) ***HUD requirements.*** All new construction projects must also meet the requirements described in this paragraph:

(i) ***Accessibility.*** The housing must meet the accessibility requirements of 24 CFR part 8, which implements section 504 of the Rehabilitation Act of 1973 (29 U.S.C. 794), and Titles II and III of the Americans with Disabilities Act (42 U.S.C. 12131-12189) implemented at 28 CFR parts 35 and 36, as applicable. "Covered multifamily dwellings," as defined at 24 CFR 100.201, must also meet the design and construction requirements at 24 CFR 100.205, which implements the Fair Housing Act (42 U.S.C. 3601-3619).

(ii) ***Energy efficiency.*** The housing must meet the energy efficiency standards established pursuant to section 109 of the Cranston-Gonzalez National Affordable Housing Act (42 U.S.C. 12709).

(iii) ***Disaster mitigation.*** Where relevant, the housing must be constructed to mitigate the impact of potential disasters (e.g., earthquakes, hurricanes, flooding, and wildfires), in accordance with State and local codes, ordinances, or other State and local requirements, or such other requirements as HUD may establish.

(iv) ***Written cost estimates, construction contracts, and construction documents.*** The grantee must ensure the construction contract(s) and construction documents describe the work to be undertaken in adequate detail so that inspections can be conducted. The grantee must review and approve written cost estimates for construction and determine that costs are reasonable.

(v) ***Construction progress inspections.*** The grantee must conduct progress and final inspections of construction to ensure that work is done in accordance with the applicable codes, the construction contract, and construction documents.

(vi) ***Broadband infrastructure.*** For new commitments made after January 19, 2017 for a new construction housing project of a building with more than 4 rental units, the construction must include installation of broadband infrastructure, as this term is defined in 24 CFR 5.100, except where the grantee determines and, in accordance with § 93.407(a)(2)(iv), documents the determination that:

(A) The location of the new construction makes installation of broadband infrastructure infeasible; or

(B) The cost of installing broadband infrastructure would result in a fundamental alteration in the nature of its program or activity or in an undue financial burden.

(b) ***Rehabilitation projects.*** All rehabilitation that is performed using HTF funds must meet the requirements of this paragraph (b).

(1) ***Rehabilitation standards.*** The grantee must establish rehabilitation standards for all HTF-assisted housing rehabilitation activities that set forth the requirements that the housing must meet upon project completion. The grantee's description of its standards must be in sufficient detail to determine the required rehabilitation work including methods and materials. The standards may refer to applicable codes or they may

establish requirements that exceed the minimum requirements of the codes. The rehabilitation standards must address each of the following:

(i) ***Health and safety.*** The grantee's standards must identify life-threatening deficiencies that must be addressed immediately if the housing is occupied.

(ii) ***Major systems.*** Major systems are: structural support; roofing; cladding and weatherproofing (e.g., windows, doors, siding, gutters); plumbing; electrical; and heating, ventilation, and air conditioning. For rental housing, the grantee's standards must require the grantee to estimate (based on age and condition) the remaining useful life of these systems, upon project completion of each major system. For multifamily housing projects of 26 units or more, the grantee's standards must require the grantee to determine the useful life of major systems through a capital needs assessment of the project. For rental housing, if the remaining useful life of one or more major system is less than the applicable period of affordability, the grantee's standards must require the grantee to ensure that a replacement reserve is established and monthly payments are made to the reserve that are adequate to repair or replace the systems as needed. For homeownership housing, the grantee's standards must require, upon project completion, each of the major systems to have a remaining useful life for a minimum of 5 years or for such longer period specified by grantee, or the major systems must be rehabilitated or replaced as part of the rehabilitation work.

(iii) ***Lead-based paint.*** The grantee's standards must require the housing to meet the lead-based paint requirements at 24 CFR part 35.

(iv) ***Accessibility.*** The grantee's standards must require the housing to meet the accessibility requirements in 24 CFR part 8, which implements section 504 of the Rehabilitation Act of 1973 (29 U.S.C. 794), and Titles II and III of the Americans with Disabilities Act (42 U.S.C. 12131-12189) implemented at 28 CFR parts 35 and 36, as applicable. “Covered multifamily dwellings,” as defined at 24 CFR 100.201, must also meet the design and construction requirements at 24 CFR 100.205, which implements the Fair Housing Act (42 U.S.C. 3601-3619). Rehabilitation may include improvements that are not required by regulation or statute that permit use by a person with disabilities.

(v) [Reserved].

(vi) ***Disaster mitigation.*** Where relevant, the grantee's standards must require the housing to be improved to mitigate the impact of potential disasters (e.g., earthquake, hurricanes, flooding, and wildfires) in accordance with State and local codes, ordinances, and requirements, or such other requirements as HUD may establish.

(vii) ***State and local codes, ordinances, and zoning requirements.*** The grantee's standards must require the housing to meet all applicable State and local codes, ordinances, and requirements or, in the absence of a State or local building code, the International Existing Building Code of the International Code Council.

(viii) ***Uniform Physical Condition Standards.*** The standards of the grantee must be such that, upon completion, the HTF-assisted project and units will be decent, safe, sanitary, and in good repair as described in 24 CFR 5.703. HUD will establish the minimum deficiencies that must be corrected under the grantee's rehabilitation standards based on inspectable items and inspected areas from HUD-prescribed physical inspection procedures (Uniform Physical Conditions Standards) pursuant to 24 CFR 5.705.

(ix) ***Capital Needs Assessments.*** For multifamily rental housing projects of 26 or more total units, the grantee must determine all work that will be performed in the rehabilitation of the housing and the long-term physical needs of the project through a capital needs assessment of the project.

(x) ***Broadband infrastructure.*** For new commitments made after January 19, 2017 for a substantial rehabilitation project of a building with more than 4 rental units, any substantial rehabilitation, as defined in 24 CFR 5.100, must provide for installation of broadband infrastructure, as this term is also defined in 24 CFR 5.100, except where the grantee determines and, in accordance with § 93.407(a)(2)(iv), documents the determination that:

(A) The location of the substantial rehabilitation makes installation of broadband infrastructure infeasible;

(B) The cost of installing broadband infrastructure would result in a fundamental alteration in the nature of its program or activity or in an undue financial burden; or

(C) The structure of the housing to be substantially rehabilitated makes installation of broadband infrastructure infeasible.

(2) ***Construction documents and cost estimates.*** The grantee must ensure that the work to be undertaken will meet the grantee's rehabilitation standards. The construction documents (i.e., written scope of work to be performed) must be in sufficient detail to establish the basis for a uniform inspection of the housing to determine compliance with the grantee's standards. The grantee must review and approve a written cost estimate for rehabilitation after determining that costs are reasonable.

(3) ***Frequency of inspections.*** The grantee must conduct an initial property inspection to identify the deficiencies that must be addressed. The grantee must conduct progress and final inspections to determine that work was done in accordance with work write-ups.

(c) *Acquisition of standard housing.*

(1) Existing housing that is acquired with HTF assistance for rental housing, and that was newly constructed or rehabilitated less than 12 months before the date of commitment of HTF funds, must meet the property standards of paragraph (a) or paragraph (b) of this section, as applicable, for new construction and rehabilitation projects. The grantee must document this compliance based upon a review of approved building plans and Certificates of Occupancy, and an inspection that is conducted no earlier than 90 calendar days before the date of commitment of HTF assistance.

(2) All other existing housing that is acquired with HTF assistance for rental housing must meet the rehabilitation property standards requirements of paragraph (b) of this section. The grantee must document this compliance based upon an inspection that is conducted no earlier than 90 calendar days before the date of commitment of HTF assistance. If the property does not meet these standards, HTF funds cannot be used to acquire the property unless it is rehabilitated to meet the standards of paragraph (b) of this section.

(3) Existing housing that is acquired for homeownership (e.g., down payment assistance) must be decent, safe, sanitary, and in good repair. The grantee must establish standards to determine that the housing is decent, safe, sanitary, and in good repair. At minimum, the standards must provide that the housing meets all applicable State and local standards and code requirements and the housing does not contain the specific deficiencies proscribed by HUD based on the applicable inspectable items and inspected areas in HUD-prescribed physical inspection procedures (Uniform Physical Condition Standards) issued pursuant to 24 CFR 5.705. The grantee must inspect the housing and document this compliance based upon an inspection that is conducted no earlier than 90 calendar days before the date of commitment of HTF assistance. If the housing does not meet these standards, the housing must be rehabilitated to meet the standards of this paragraph (c)(3) or it cannot be assisted with HTF funds.

(d) *Manufactured housing.*

Construction of all manufactured housing (including manufactured housing that replaces an existing substandard unit under the definition of “reconstruction”) must meet the Manufactured Home Construction and Safety Standards codified at 24 CFR part 3280. These standards preempt State and local codes which are not identical to the Federal standards for the new construction of manufactured housing. The grantees providing HTF funds to assist manufactured housing units must comply with applicable State and local laws or codes. In the absence of such laws or codes, the installation must comply with the manufacturer's written instructions for installation of manufactured housing units.

All new manufactured housing and all manufactured housing that replaces an existing substandard unit under the definition of “reconstruction” must be on a permanent foundation that meets the requirements for foundation systems as set forth in 24 CFR 203.43f(c)(i). All new manufactured housing (and all manufactured housing that replaces an existing substandard unit under the definition of “reconstruction”) must, at the time of project completion, be connected to permanent utility hook-ups and be located on land that is owned by the manufactured housing unit owner or land for which the manufactured housing owner has a lease for a period at least equal to the applicable period of affordability.

In HTF-funded rehabilitation of existing manufactured housing the foundation and anchoring must meet all applicable State and local codes, ordinances, and requirements or in the absence of local or State codes, the Model Manufactured Home Installation Standards at 24 CFR part 3285. Manufactured housing that is rehabilitated using HTF funds must meet the property standards requirements in paragraph (b) of this section, as applicable. The grantee must document this compliance in accordance with inspection procedures that the grantee has established pursuant to § 92.301, as applicable.

(e) *Ongoing property condition standards: Rental housing.*

(1) ***Ongoing property standards.*** The grantee must establish property standards for rental housing (including manufactured housing) that apply throughout the affordability period. The standards must ensure that owners maintain the housing as decent, safe, and sanitary housing in good repair. The grantee's description of its property standards must be in sufficient detail to establish the basis for a uniform inspection of HTF rental projects. The grantee's ongoing property standards must address each of the following:

(i) At a minimum, the grantee's ongoing property standards must include all inspectable items and inspectable areas specified by HUD based on the HUD physical inspection procedures (Uniform Physical Condition Standards (UPCS)) prescribed by HUD pursuant to 24 CFR 5.705.

(ii) ***Health and safety.*** The grantee's standards must require the housing to be free of all health and safety defects. The standards must identify life-threatening deficiencies that the owner must immediately correct and the time frames for addressing these deficiencies.

(iii) ***Lead-based paint.*** The grantee's standards must require the housing to meet the lead-based paint requirements in 24 CFR part 35.

(2) ***Inspections.*** The grantee must undertake ongoing property inspections, in accordance with § 93.404.

(3) ***Corrective and remedial actions.*** The grantee must have procedures for ensuring that timely corrective and remedial actions are taken by the project owner to address identified deficiencies.

(4) ***Inspection procedures.*** The grantee must establish written inspection procedures. The procedures must include detailed inspection checklists, description of how and by whom inspections will be carried out, and procedures for training and certifying qualified inspectors. The procedures must also describe how frequently the property will be inspected, consistent with section § 93.404(d).

(f) *Environmental provisions.*

(1) ***New construction projects environmental requirements***

(i) ***Historic preservation*** - **(A)** ***Standards.*** The project activities (including demolition) must not be performed on properties that are either listed in or determined eligible for listing in the National Register of Historic Places, unless the project activities meet the *Secretary of the Interior's Standards for Rehabilitation,* either as certified through the Federal and/or State historic rehabilitation tax credit programs or as verified by someone that meets the relevant *Secretary of the Interior's Professional Qualification Standards;*

(B) ***Archaeological resources.*** If archaeological resources or human remains are discovered on the project site during construction, the grantee must consult with affected tribes and/or descendant communities and comply with the Native American Graves Protection and Repatriation Act (25 U.S.C. 3001-3013), State law and/or local ordinance (e.g., State unmarked burial law).

(ii) ***Farmland.*** Project activities must not result in the conversion of unique, prime, or statewide or locally significant agricultural properties to urban uses.

(iii) ***Airport zones.*** Projects are not permitted within the runway protection zones of civilian airports, or the clear zones or accident potential zones of military airfields.

(iv) Coastal Barrier Resource System. No projects may be assisted in Coastal Barrier Resource System (CBRS) units. CBRS units are mapped and available from the U.S. Fish and Wildlife Service.

(v) Coastal zone management. Development must be consistent with the appropriate State coastal zone management plan. Plans are available from the local coastal zone management agency.

(vi) ***Floodplains.*** Except as modified below, definitions for terms used below can be found at 24 CFR part 55.

(A) Construction and other activities in the 100-year floodplain are to be avoided when practicable. If there are no practicable alternatives to new construction or substantial improvement in the 100-year floodplain, the structure must be elevated at least the base flood elevation (BFE) or flood proofed to one foot above the BFE. Elevated and flood proofed buildings must adhere to National Flood Insurance Program standards. The primary sources of floodplain data are Federal Emergency Management Agency (FEMA) Flood Insurance Rate Maps (FIRMs). When FEMA provides interim flood hazard data, such as Advisory Base Flood Elevations (ABFE) or preliminary maps or studies, the latest of these sources must be used.

(B) No HTF assistance may be approved with respect to:

(1) Any action, other than a functionally dependent use, located in a floodway;

(2) Any new construction critical action located in a coastal high hazard area, 100- or 500-year floodplain; or

(3) Any non-critical new construction action in a coastal high hazard area, unless the action is reconstruction following destruction caused by a disaster and is designed for location in a coastal high hazard area consistent with the FEMA National Flood Insurance Program requirements for V-Zones.

(vii) ***Wetlands.***

(A) No draining, dredging, channelizing, filling, diking, impounding, or related grading activities are to be performed in wetlands. No activities, structures, or facilities funded under this program are to adversely impact a wetland.

(B) A wetland means those areas that are inundated by surface or ground water with a frequency sufficient to support, and under normal circumstances, does or would support a prevalence of vegetative or aquatic life that requires saturated or seasonally saturated soil conditions for growth and reproduction. Wetlands generally include swamps, marshes, bogs, and similar areas such as sloughs, potholes, wet meadows, river overflows, mud flats, and natural ponds. This definition includes those wetland areas separated from their natural supply of water as a result of activities, such as the construction of structural flood protection methods or solid-fill road beds, or mineral extraction and navigation improvements. This definition is independent of the definition of jurisdictional wetland used by the U. S. Army Corps of Engineers under section 404 of the Clean Water Act (33 U.S.C. 1251 et seq.).

(viii) ***Explosives and hazards.*** Projects must be in compliance with the standards for acceptable separation distance, as set forth at 24 CFR part 51, subpart C.

(ix) ***Contamination.*** All properties assisted with HTF funds must be free of hazardous materials, contamination, toxic chemicals and gases, and radioactive substances, where a hazard could affect the health and safety of occupants or conflict with the intended use of the property.

(A) All proposed multifamily (more than four housing units) HTF projects require a Phase I Environmental Site Assessment (ESA-ASTM). If the Phase I ESA identifies recognized environmental concerns (RECs), a Phase II (ESA-ASTM) will be required. ASTM reports must be prepared in accordance with the most current ASTM standard. Single family housing does not require a Phase I ESA.

(B) HTF projects must avoid sites located within 0.25 miles of a Superfund or CERCLIS (Comprehensive Environmental Response, Compensation, and Liability Information System) site or other contaminated site reported to Federal, State, or local authorities without a statement in writing from the U.S. Environmental

Protection Agency (EPA) or the appropriate State agency that there is no hazard that could affect the health and safety of the occupants or conflict with the intended use of the property.

(x) ***Noise.***

(A) Internal noise levels: All activities will be developed to ensure an interior noise level of no more than 45 decibels (dB).

(B) External noise levels:

(1) Project sites exposed to less than or equal to 65 dB of environmental noise are acceptable.

(2) Sites between 65 dB and less than 75 dB are acceptable with mitigation (e.g., noise walls, careful site planning) that result in an interior standard of 45 dB.

(3) Locations with environmental noise levels of 75 dB or greater may not have noise sensitive outdoor uses (e.g., picnic areas, tot lots, balconies, or patios) and require sound attenuation in the building shell to achieve the 45 dB interior standard.

(xi) ***Endangered species.*** The grantee must avoid all actions which could jeopardize the continued existence of any endangered or threatened species, as designated by the U.S. Fish and Wildlife Service or National Marine Fisheries Service, or would result in the destruction or adversely modify the designated critical habitat of such species.

(xii) ***Wild and scenic rivers.*** The grantee must avoid activities that are inconsistent with conservation easements, land-use protections, and restrictions adjacent to wild and scenic rivers, as designated/listed by the Departments of Agriculture or Interior. Maps for the National Wild and Scenic Rivers System are available at the governing departments.

(xiii) ***Safe drinking water.*** Projects with a potable water system must use only lead-free pipes, solder, and flux.

(xiv) ***Sole-source aquifers.*** Project activities should avoid sites and activities that have the potential to contaminate sole source aquifer areas (SSAs). EPA defines a sole or principal source aquifer as an aquifer that supplies at least 50 percent of the drinking water consumed in the area overlying the aquifer. If the project overlies an SSA, EPA must review the project. EPA review is designed to reduce the risk of ground water contamination that could pose a health hazard to those who use it.

(2) ***Rehabilitation projects environmental requirements***.

(i) Historic preservation.

(A) The project activities (including demolition) must not be performed on properties that are either listed in or determined eligible for listing in the National Register of Historic Places, unless the project activities meet the *Secretary of the Interior's Standards for Rehabilitation,* either as certified through the Federal and/or State historic rehabilitation tax credit programs or as verified by someone that meets the relevant *Secretary of the Interior's Professional Qualification Standards;*

(B) ***Archaeological resources.*** If archaeological resources or human remains are discovered on the project site during construction or rehabilitation, the grantee must consult with affected tribes and/or descendant communities and comply with the Native American Graves Protection and Repatriation Act (25 U.S.C. 3001-3013), State law, and/or local ordinance (*e.g.,* State unmarked burial law).

(ii) ***Farmland.*** Project activities must not result in the conversion of unique, prime, or locally significant agricultural properties to urban uses.

(iii) ***Airport zones.*** Projects are not permitted within the runway protection zones of civilian airports, or the clear zones or accident potential zones of military airfields.

(iv) ***Coastal Barrier Resource System.*** No projects may be assisted in Coastal Barrier Resource System (CBRS) units. CBRS units are mapped and available from the U.S. Fish and Wildlife Service.

(v) ***Coastal zone management.*** Development must be consistent with the appropriate State coastal zone management plan. Plans are available from the local coastal zone management agency.

(vi) ***Floodplains.*** Except as modified below, definitions for terms used below can be found at 24 CFR part 55.

(A) Construction and other activities in the 100-year floodplain are to be avoided when practicable. If there are no practicable alternatives to new construction or substantial improvement in the 100-year floodplain, the structure must be elevated at least to the base flood elevation (BFE) or floodproofed to one foot above the BFE. Elevated and floodproofed buildings must adhere to National Flood Insurance Program standards. The primary sources of floodplain data are Federal Emergency Management Agency (FEMA) Flood Insurance Rate Maps (FIRMS). When FEMA provides interim flood hazard data, such as Advisory Base Flood Elevations (ABFE) or preliminary maps or studies, the latest of these sources must be used.

(B) No HTF assistance may be approved with respect to:

(1) Any action, other than functionally dependent uses, located in a floodway;

(2) Any critical action located in a coastal high hazard area, 100- or 500-year floodplain; or

(3) Any non-critical action located in a coastal high hazard area, unless the action is designed for location in a coastal high hazard area consistent with the FEMA National Flood Insurance Program requirements for V-Zones. "Any non-critical action in a coastal high hazard area, unless the action is reconstruction following destruction caused by a disaster and is designed for location in a coastal high hazard area consistent with the FEMA National Flood Insurance Program requirements for V-Zones."

(vii) ***Wetlands.*** No rehabilitation of existing properties that expands the footprint into a wetland is allowed. A wetland means those areas that are inundated by surface or ground water with a frequency sufficient to support, and under normal circumstances, does or would support a prevalence of vegetative or aquatic life that requires saturated or seasonally saturated soil conditions for growth and reproduction. Wetlands generally include swamps, marshes, bogs, and similar areas such as sloughs, potholes, wet meadows, river overflows, mud flats, and natural ponds. This definition includes those wetland areas separated from their natural supply of water as a result of activities such as the construction of structural flood protection methods or solid-fill road beds and activities such as mineral extraction and navigation improvements. This definition is independent of the definition of jurisdictional wetland used by the U.S. Army Corps of Engineers under section 404 of the Clean Water Act (33 U.S.C. 1251 *et seq.*).

(viii) ***Explosives and hazards.*** If the rehabilitation of the building increases the number of dwelling units, then the project must be in compliance with the standards for acceptable separation distance as set forth at 24 CFR part 51, subpart C.

(ix) ***Contamination.*** All properties assisted with HTF funds must be free of hazardous materials, contamination, toxic chemicals and gases, and radioactive substances, where a hazard could affect the health and safety of occupants or conflict with the intended use of the property:

(A) All proposed multifamily (more than four housing units) HTF project activities require a Phase I Environmental Site Assessment (ESA - ASTM). If the Phase I ESA identifies recognized environmental concerns (RECs), a Phase II (ESA-ASTM) will be required. ASTM reports must be prepared in accordance with the most current ASTM standard. Single family housing does not require a Phase I ESA.

(B) HTF projects must avoid sites located within 0.25 miles of a Superfund or CERCLIS (Comprehensive Environmental Response, Compensation, and Liability Information System) site or other contaminated site reported to Federal, State, or local authorities without a statement in writing from EPA or the appropriate State agency that there is no hazard that could affect the health and safety of the occupants or conflict with the intended utilization of the property.

(x) ***Noise***.

(A) ***Internal noise levels.*** All activities will be developed to ensure an interior noise level of no more Than 45 decibels (dB).

(B) [Reserved].

(xi) ***Endangered species.***

(A) The grantee must avoid all actions that could jeopardize the continued existence of any species designated by the U.S. Fish and Wildlife Service or National Marine Fisheries Service as endangered or threatened.

(B) The grantee must avoid all actions that adversely modify the critical habitat of such species.

(xii) ***Wild and scenic rivers.*** The grantee must avoid activities that are inconsistent with conservation easements, land-use protections, and restrictions adjacent to wild and scenic rivers, as designated/listed by the Departments of Agriculture and Interior. Maps for the National Wild and Scenic Rivers System are available at the governing departments.

(xiii) ***Safe drinking water.*** Projects with a potable water system must use only lead-free pipes, solder, and flux.

(xiv) ***Sole-source aquifers.*** Project activities should avoid sites and activities that have the potential to contaminate sole source aquifer areas (SSAs). The EPA defines a sole or principal source aquifer as an aquifer that supplies at least 50 percent of the drinking water consumed in the area overlying the aquifer. If the project overlies an SSA, the EPA must review the project. The EPA review is designed to reduce the risk of ground water contamination, which could pose a health hazard to those who use it.

(3) ***Acquisition projects environmental requirements.***

(i) (A) Existing housing that is acquired with HTF funds, and has been newly constructed or rehabilitated less than 12 months before the commitment of HTF funds must meet the property standards at paragraph (f)(1) of this section.

(B) All other existing housing that is acquired with HTF assistance must meet the property standards requirements of paragraph (f)(2) of this section.

(ii) If under paragraph (f)(3)(i)(A) or paragraph (B) of this section, the property does not meet these standards, with the exception of the noise standards in paragraph (f)(2) of this section, HTF funds cannot be used to acquire the property.

(4) ***Manufactured housing environmental requirements.*** Manufactured housing is subject to the environmental standards in paragraph (f)(1) of this section for new construction or paragraph (f)(2) of this section for rehabilitation, as applicable. If an existing property does not meet these standards, HTF funds cannot be used to acquire the property unless it is rehabilitated to meet the standards in paragraph (f)(2), as applicable, with the exception of noise standards in paragraph (f)(2)(x).

APPENDIX F: CBDG-DR PROPERTY STANDARDS

In addition to the Standards outlined in the DAS, for all projects receiving CDBG-DR funds the following provisions will be applicable as per 84 FR 5844.

B. Housing and Related Floodplain Issues

32. Housing-related eligibility waivers.

a. Green Building Standard for Replacement and New Construction of Residential Housing. Grantees must meet the Green Building Standard in this subparagraph for: (i) All new construction of residential buildings and (ii) all replacement of substantially damaged residential buildings. Replacement of residential buildings may include reconstruction (i.e., demolishing and rebuilding a housing unit on the same lot in substantially the same manner) and may include changes to structural elements such as flooring systems, columns, or load bearing interior or exterior walls.

b. Meaning of Green Building Standard. For purposes of this notice, the Green Building Standard means the grantee will require that all construction covered by subparagraph a, above, meet an industry-recognized standard that has achieved certification under at least one of the following programs: (i) ENERGY STAR (Certified Homes or Multifamily High-Rise), (ii) Enterprise Green Communities, (iii) LEED (New Construction, Homes, Midrise, Existing Buildings Operations and Maintenance, or Neighborhood Development), (iv) ICC–700 National Green Building Standard, (v) EPA Indoor AirPlus (ENERGY STAR a prerequisite), or (vi) any other equivalent comprehensive green building program acceptable to HUD. Grantees must identify which Green Building Standard will be used in the program policies and procedures.

c. Standards for rehabilitation of nonsubstantially damaged residential buildings. For rehabilitation other than that described in subparagraph a, above, grantees must follow the guidelines specified in the HUD CPD Green Building Retrofit Checklist, available at https://www.hudexchange.info/resource/3684/guidance-on-the-cpdgreen-building-checklist/. Grantees must apply these guidelines to the extent applicable to the rehabilitation work undertaken, including the use of mold resistant products when replacing surfaces such as drywall. When older or obsolete products are replaced as part of the rehabilitation work, rehabilitation is required to use ENERGY STAR-labeled, WaterSense-labeled, or Federal Energy Management Program (FEMP)-designated products and appliances. For example, if the furnace, air conditioner, windows, and appliances are replaced, the replacements must be ENERGY STAR-labeled or FEMP-designated products; WaterSense-labeled products (e.g., faucets, toilets, showerheads) must be used when water products are replaced. Rehabilitated housing may also implement measures recommended in a Physical Condition Assessment (PCA) or Green Physical Needs Assessment (GPNA).

d. Implementation of green building standards.

(i) For construction projects completed, underway, or under contract prior to the date that assistance is approved for the project, the grantee is encouraged to apply the applicable standards to the extent feasible, but the Green Building Standard is not required.

(ii) For specific required equipment or materials for which an ENERGY STAR- or WaterSense-labeled or FEMP-designated product does not exist, the requirement to use such products does not apply.

e. Elevation standards for new construction, repair of substantial damage, or substantial improvement. The following elevation standards apply to new construction, repair of substantial damage, or substantial improvement of structures located in an area delineated as a flood hazard area or equivalent in FEMA's data source identified in 24 CFR 55.2(b)(1). All structures, defined at 44 CFR 59.1, designed principally for residential use and located in the 100-year (or 1 percent annual chance) floodplain that receive assistance for new construction, repair of substantial damage, or substantial improvement, as defined at 24 CFR 55.2(b)(10), must be elevated with the lowest floor, including the basement, at least two feet above the base flood elevation. Mixed-use structures with no dwelling

units and no residents below two feet above base flood elevation, must be elevated or floodproofed, in accordance with FEMA flood proofing standards at 44 CFR 60.3(c)(3)(ii) or successor standard, up to at least two feet above base flood elevation. Please note that grantees should review the UFAS accessibility checklist available at https://www.hudexchange.info/resource/796/ufas-accessibilitychecklist/ and the HUD Deeming Notice, 79 FR 29671 (May 23, 2014) to ensure that these structures comply with accessibility requirements.

All Critical Actions, as defined at 24 CFR 55.2(b)(3), within the 500-year (or 0.2 percent annual chance) floodplain must be elevated or flood proofed (in accordance with the FEMA standards) to the higher of the 500-year floodplain elevation or three feet above the 100-year floodplain elevation. If the 500-year floodplain is unavailable, and the Critical Action is in the 100-year floodplain, then the structure must be elevated or flood proofed at least three feet above the 100-year floodplain elevation. Critical Actions are defined as an ‘‘activity for which even a slight chance of flooding would be too great, because such flooding might result in loss of life, injury to persons or damage to property.’’ For example, Critical Actions include hospitals, nursing homes, police stations, fire stations and principal utility lines.

Applicable State, local, and tribal codes and standards for floodplain management that exceed these requirements, including elevation, setbacks, and cumulative substantial damage requirements, must be followed.

f. Broadband infrastructure in housing. Any substantial rehabilitation, as defined by 24 CFR 5.100, or new construction of a building with more than four rental units must include installation of broadband infrastructure, except where the grantee documents that: (a) The location of the new construction or substantial rehabilitation makes installation of broadband infrastructure infeasible; (b) the cost of installing broadband infrastructure would result in a fundamental alteration in the nature of its program or activity or in an undue financial burden; or (c) the structure of the housing to be substantially rehabilitated makes installation of broadband infrastructure infeasible.

g. Resilient Home Construction Standard. Grantees are strongly encouraged to incorporate a Resilient Home Construction Standard, meaning that all construction covered by subparagraph (a) meet an industry-recognized standard such as those set by the FORTIFIED Home™ Gold level for new construction of single-family, detached homes; and FORTIFIED Home™ Silver level for reconstruction of the roof, windows and doors; or FORTIFIED Home™ Bronze level for repair or reconstruction of the roof; or any other equivalent comprehensive resilient or disaster resistant building program. Further, grantees are strongly encouraged to meet the FORTIFIED Home™ Bronze level standard for roof repair or reconstruction, for all construction covered under subparagraph B.32.c.

FORTIFIED Home™ is a risk-reduction program providing construction standards for new homes and retrofit standards for existing homes, which will increase a home's resilience to natural hazards, including high wind, hail, and tropical storms. Insurers can provide discounts for homeowner's insurance for properties certified as FORTIFIED. Grantees should advise property owners to contact their insurance agent for current information on what discounts may be available. More information is also available at: https://disastersafety.org/fortified/fortified-home/.

In addition to the requirements listed above, all project receiving CDBG-DR funds must comply with the HUD Lead Safe Housing Rule outlined in **24 CFR part 35, subparts A, B, J, K, and R**, as well as the environmental requirements at **24 CFR part 58**.