

IOWA CITY HISTORIC PRESERVATION COMMISSION

Thursday, December 10, 2020

Electronic Meeting – 5:30 p.m.

Zoom Meeting Platform

Electronic Meeting

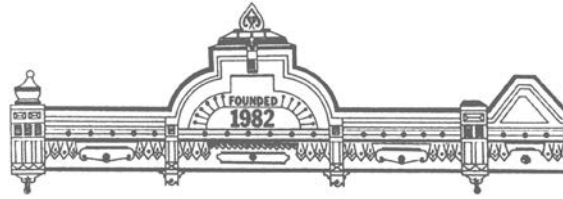
(Pursuant to Iowa Code section 21.8)

An electronic meeting is being held because a meeting in person is impossible or impractical due to concerns for the health and safety of Commission members, staff and the public presented by COVID-19.

You can participate in the meeting and can comment on an agenda item by going to <https://zoom.us/meeting/register/tj0pcumuqjMjGNDJnY9-AUgYKfjkuFrTlgl> to visit the Zoom meeting's registration page and submitting the required information. Once approved, you will receive an email message with a link to join the meeting. If you are asked for a meeting or webinar ID, enter the ID number found in the email. If you have no computer or smartphone, or a computer without a microphone, you can call in by phone by dialing (312) 626-6799 and entering the meeting ID 994 5064 8924 when prompted. Providing comment in person is not an option.

Agenda

- A) Call to Order**
- B) Roll Call**
- C) Public discussion of anything not on the agenda**
- D) Public Hearing Local Landmark Designation – 410/412 North Clinton Street – Cochrane-Sharpless-Dennis House**
- E) Certificate of Appropriateness**
1133 East Court Street – Longfellow Historic District (synthetic and original siding removal and replacement and porch redesign)
- F) Report on Certificates issued by Chair and Staff**
 - Certificate of No Material Effect – Chair and Staff review**
 1. 1133 East Court Street – Longfellow Historic District (roof shingle replacement)
 2. 12 Bella Vista Place – Brown Street Historic District (storm damaged roof and internal gutter replacement)
 - Minor Review –Staff review**
 1. 533 South Lucas Street – Governor-Lucas Street Conservation District (storm repair to rear including window replacement)



2. 420 East Jefferson Street – Jefferson Street Historic District (front step and railing replacement)
3. 1527 Muscatine Avenue – Dearborn Street Conservation District (past approval revised to include window replacement)

Intermediate Review –Chair and Staff review

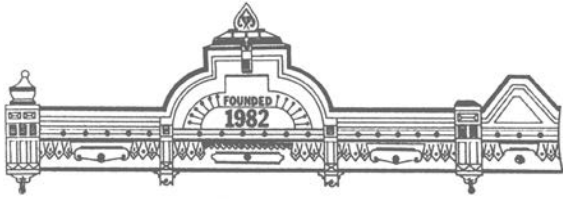
1. 534 Clark Street – Clark Street Conservation District (addition to an existing screened porch)
2. 430 Oakland – Longfellow Historic District (minor review to previous COA for new garage and curb cut)

G) Consideration of Minutes for November 12, 2020

H) Commission Information

I) Adjournment

If you will need disability-related accommodations in order to participate in this meeting, please contact Jessica Bristow, Urban Planning, at 319-356-5243 or at jessica-bristow@iowa-city.org. Early requests are strongly encouraged to allow sufficient time to meet your access needs.



Memorandum

Date: December 3, 2020
To: Historic Preservation Commission
From: Jessica Bristow, Historic Preservation Planner
Re: 410-412 North Clinton Street, Cochrane-Sharpless-Dennis House

A sub-committee of the Commission completed a study and identified several of Iowa City's early brick houses as priorities for local landmark designation. The subcommittee requested that the property at 410 N. Clinton Street, the Cochrane-Sharpless-Dennis House, be designated as an Iowa City Historic Landmark in late 2017. In Spring 2018, a supermajority of Council failed to approve that landmark designation.

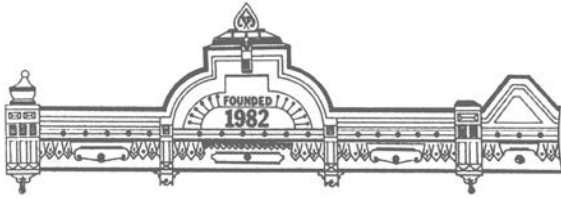
Since then, City staff has worked with developers to create a plan for redevelopment of the neighboring properties to the South and the rear portion of this property. This plan also includes landmark designation of this property and a rehabilitation plan for the historic house that would be approved by the Historic Preservation Commission following the landmark designation and completed prior to completion of the development project.

The enclosed Iowa Site Inventory Form provides a discussion of the building's history and architecture and the enclosed summary sheet provides additional information obtained through staff and Commission research. Indications are that the building was built in 1865. It should be noted that the historic portion of the house currently functions as a rooming house and provides affordable housing that is no longer allowed by code. This type of housing includes individual living spaces and shared bathrooms, providing housing for those who do not need or cannot afford more private space.

Designation of the property as an Iowa City Historic Landmark will require Commission approval of any significant changes to the exterior of the building. Landmark status will also make the property eligible for special exceptions that would allow the Board of Adjustment to waive or modify certain zoning requirements.

The Commission should determine if the property meets both Criteria A and B and at least one of the additional criteria (C-F) for local designation listed below:

- a. Significant to American and/or Iowa City history, architecture, archaeology and culture;
- b. Possesses integrity of location, design, setting, materials and workmanship;
- c. Associated with events that have made a significant contribution to the broad patterns of our history;
- d. Associated with the lives of persons significant in our past;
- e. Embodies the distinctive characteristics of a type, period, or method of construction; or represents the work of a master; or possesses high artistic values; or represents a significant and distinguishable entity whose components may lack individual distinction;
- f. Has yielded or may likely yield information important in prehistory or history.



Iowa City
Historic Preservation Commission
City Hall, 410 E Washington Street, Iowa City, IA. 52240

Staff finds that 410-412 N. Clinton Street meets criteria A in that it is one of Iowa City's few remaining Civil War-era homes and criteria B in that it is an intact example of Italianate residential architecture in Iowa City that is not diminished by the addition because it is located behind the house. Staff finds that it meets criteria D in because of its association with active prominent members of the Iowa City community especially Cochrane and Sharpless. It also meets Criterion E as an intact representative of the Italianate-style architecture in Iowa City

Recommended Motion:

Move to approve the designation of 410-412 N. Clinton Street as an Iowa City Historic Landmark based on the following criteria for local designation: criteria A, B, D, and E.

Cochrane-Sharpless-Dennis House

410 North Clinton



410 North Clinton Street, built in 1865, is a two-story brick Italianate with a low-sloped side gabled roof. Unlike typical Italianate houses where the brackets are part of an elaborate cornice in this house the simple cornice is supported on paired brackets. The full-width front porch has paired columns and decorative brackets composed of carved-curling tendrils similar to the cornice brackets. The symmetrical façade includes a classically detailed center entry with narrow sidelights and transom with deeply recessed trim. Floor-to-ceiling 4-over-6 double hung windows are symmetrically placed on the first floor. The second floor windows have heavy stone sills and lintels. The central window is 4-over-6 like the first floor windows and the windows on each side are smaller 4-over-4. The front façade also has original shutters.

Dr. Milton B. Cochrane settled in Iowa City in 1854. He was a surgeon in the 1st Iowa Cavalry and then promoted to the corps of surgeons of the United States Volunteers during the Civil War. He was a member of the State Historical Society from 1857 until his death in 1898. In 1859-60 He was a member of the Iowa City School Board. After the war he was appointed the first Superintendent of the Soldiers' Orphans Home at Davenport until he resigned in 1867. In the early 1880s he was appointed surgeon of an Indian Agency in Wisconsin.

Samuel Sharpless and his wife Priscilla Crain owned this property from 1867 until at least 1915 when Priscilla died in the home. Sharpless was a director of the Johnson County Savings Bank, supervisor of various farming industries and a member of the Iowa City Council. In 1917 Edwin E. Dennis and his wife Anna Tantlinger bought the house and passed it on to their daughter Gertrude Dennis in 1936. Gertrude taught music, was an active Presbyterian, and served as part of the local Art Circle. She owned the house until 1965.

412 North Clinton is significant for its architecture and association with prominent citizens of Iowa City.

Cochrane-Sharpless-Dennis House

410 North Clinton



IOWA SITE INVENTORY FORM
CONTINUATION SHEET

Survey ID Number 52-010-D 041

Database ID Number _____

Street Address 410-412 N. Clinton St.

City Iowa City County Johnson

Legal Description: (if Rural)

Township _____ Range _____ Section _____ Quarter _____ of _____ Quarter _____ of _____

Roll / Frame 10 / 7

Looking NE - shows brick addition at rear



Property Characteristic Form - Residential

CFN 259-1402
8/25/89

Survey ID Number 52-010-D041
Database ID Number _____

Street Address 410-412 N. Clinton St. City Iowa City County Johnson
Legal Description: (If Rural) _____ Township _____ Range _____ Section _____ Quarter _____ of Quarter _____ of _____

Location Integrity: Original Site Moved Moved to Original Site

Endangered? N or Y If yes, why? _____

Ground Plan: a. Building Shape(s) Ell w/addition b. Width _____ by Depth _____ in units

Architectural Style/Stylistic Influences	Key Stylistic Attributes	Code
<u>Late Victorian: Italianate</u>	<u>Bracketed eaves, transom & sidelights tall slender windows</u>	<u>42</u>

	<u>412</u>	<u>410</u>	<u>412 / 410</u>
Materials: Foundation	<u>Stone</u>	<u>Poured concrete</u>	<u>40 100</u>
Walls	<u>Brick</u>	<u>Brick</u>	<u>30 30</u>
Roof	<u>Metal</u>	<u>Asphalt</u>	<u>50 80</u>

Number of Stories _____ 2 3

Roof Shape Gable - very low pitch / Gable 1 1

Builder(s) Unknown Architect(s) Unknown

Original Construction Date 1865 Modification/Addition Dates:

9 unit apartment building added to rear in 1997

Note double end chimneys, original exterior shutters and original porch.

Continuation Sheet []

Significant Interior Components:

All original except for baths and kitchen

Continuation Sheet []

Surveyor Comments:

412 is very old with Italianate detailings (brackets, long windows, etc.)

410 is apartment building attached to rear of 412.

Brick built for M. B. Cochran in 1865 (from real estate appraisement records.)

Continuation Sheet []

Sources: Sanborn Fire Insurance Maps: 1888, 1892, 1899, 1906, 1912, 1920, 1926, 1933.

Keyes pp 59-60

Information provided by present owner

needs Further Study/Anomaly []

Continuation Sheet []

Surveyor Moraski/Erwin/Kugler Date 1995-96

IOWA SITE INVENTORY FORM
EVALUATION SHEET

ADDRESS: 410-412 North Clinton
Iowa City, IA

SURVEY ID # 52-010-D041

REVIEWED BY: Molly Myers Naumann, Consultant

DATE: February 1996

ARCHITECTURAL SIGNIFICANCE & ASSOCIATED CONTEXTS:

Dubuque/Linn Street Corridor: 1839-c.1946

APPLICABLE NRHP CRITERIA: A ___ B ___ C X D ___

NRHP ELIGIBILITY: INDIVIDUAL YES X NO ___

CONSERVATION DISTRICT: CONTRIBUTING X NON-CONTRIBUTING ___

This two story brick residence from c.1865 is a good example of Italianate residential design. The house is rectangular with a small two story wing to the rear. It features a symmetrical three bay facade, the entry having both transom and sidelights. On the first floor two narrow floor-length windows are paired on each side of the entrance. At the second floor level the windows appear as pairs, but without space between them. Both sills and lintels are of stone. Paired Italianate brackets are located at the cornice. The original end chimneys and exterior shutters are in place. The front porch extends across the entire facade and features slender paired posts, square in shape with chamfered corners. Delicate scroll brackets top each of the porch posts. The pitch of the gable roof is unusually low, one indication of a fairly early date. Although a multi-unit apartment building has been attached to this house at the rear, the integrity of the original structure remains quite high. It is considered to be individually eligible as a good example of its period and style, and is considered to be a strong contributing structure in the Clinton Street Conservation District.

HISTORICAL SIGNIFICANCE & ASSOCIATED CONTEXTS:

Dubuque/Linn Street Corridor: 1839-c.1946

APPLICABLE NRHP CRITERIA: A X B ___ C ___ D ___

NRHP ELIGIBILITY: INDIVIDUAL YES X NO ___

CONSERVATION DISTRICT: CONTRIBUTING X NON-CONTRIBUTING ___

The Cochrane-Dennis House from c.1865 illustrates the development of the north part of Iowa City in the years following the removal of the state capital to Des Moines. The location of the State University of Iowa here in 1855, and the arrival of the railroad in 1856, ensured the continued growth of the former seat of state government. The Cochrane-Dennis House and the Dey House across the street at 507 North Clinton appear to be the last remaining examples of early residential design in this neighborhood. Both are good examples of the Italianate style and both have been well maintained. They demonstrate the use of mass-produced building materials that became available with the arrival of the railroad. The university was housed in the Old Capitol and two other buildings located on what is now known as the Pentacrest. The area to the north was a logical location for both faculty and students to live. Clinton Street appears to have always been the western edge of the so-called North Side Neighborhood, and even from the earliest days may have been considered to be separate. The Cochrane-Dennis House is considered to be individually eligible and is also a solid contributing structure in the proposed conservation district.

PREPARED BY: Molly Myers Naumann, Consultant
ADDRESS: 167 W. Alta Vista, Ottumwa, IA 52501
AFFILIATION: Iowa City Historic Preservation Commission
ADDRESS: 401 E. Washington, Iowa City, IA 52240

PHONE: (515) 682-2743

DATE: February 1996

PHONE: (319) 356-5243

Iowa Site Inventory

Division of Historic Preservation
Iowa State Historical Department
26 E. Market St., Iowa City, Iowa 52240

52-010-871

Site Number 30-1418
District Name North Side Residential
Map Reference # 152A

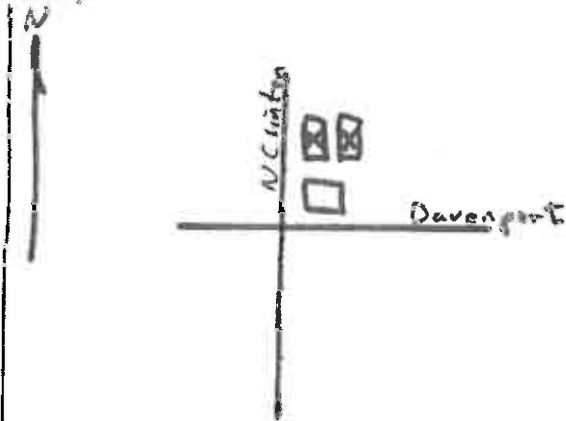
Identification

1. Site Name Sharpless-Crane House
2. Village/Town/City Iowa City Township _____ County Johnson
3. Street Address 412 North Clinton
4. Legal location OT 75 5,6 N $\frac{1}{2}$ of each
Urban: Rural: subdivision township block range parcel section subsection or section of 1/4 section
5. UTM Location: zone _____ easting _____ northing _____; Acreage -1 Acre
6. Owner(s) Name Schweitzer, Willard W. (contract to) Crane, Robert C. (1/2 interest)
7. Owner(s) Address 23 George Street
(street address) (City) (State) (Zip)
8. Use: Present Original

Description

9. Date of Construction 1865 Architect/Builder unknown
10. Building Type:
 single-family dwelling industrial other institutional religious
 multiple-family dwelling 2 educational public agricultural
 commercial
11. Exterior Walls: clapboard stone brick board and batten shingles stucco
 other _____
12. Structural System: wood frame with interlocking joints wood frame with light members (balloon frame)
 masonry load-bearing walls iron frame steel frame with curtain walls reinforced concrete
 other _____
13. Condition: excellent good fair deteriorated
14. Integrity: original site moved—if so, when? _____
 Notes on alterations, additions (with dates and architect, if known) and any other notable features of building and site: _____
15. Related Outbuildings and Property: barn other farm structures carriage house garage privy
 other three-story brear building, brick veneer, nine apartments (intrusion)
16. Is the building endangered? no yes—if so, why? _____
17. Surroundings of the building: open land woodland scattered outbuildings densely built-up commercial
 industrial residential other _____

18. Map



19. Photo

Roll 13 Frame 8 View NE



Significance

(Indicate sources of information for all statements)

20. Architectural significance

- a. Key structure/individually may qualify for the National Register
- b. Contributing structure
- c. Not eligible/intrusion

Well preserved gable sided brick house with low pitched roof. Features Italianate front porch and paired cornice brackets. Windows on the first floor are full length, those on the second floor are paired beneath stone lintels and sills. The center window on the second floor is floor length as well.

See continuation sheet.

21. Historical Significance

Theme(s) _____

Italianate—Two story side gable

- a. Key structure/individually may qualify for the National Register
- b. Contributing structure
- c. Not eligible/intrusion

The Samuel Sharpless family owned the house as late as 1912, and he was noted for his local investment activities as well as for his having served as Director of the Johnson County Savings Bank for twenty five years. Gertrude F. Dennis owned the house from 1935 through the early 1950's at least.

22. Sources (for primary and secondary sources, give complete facts of publication: author, title, place of publication, date, etc.):

Prepared by James E. Jacobsen Date _____
Address _____ Telephone _____
Organization _____

For Division of Historic Preservation Use Only

1. Office Information Sources on this Property

- County Resource File
- Windshield Survey
- National Register
- Grants-In-Aid: _____
- Determination of Eligibility

Review and Compliance Project:

- Other _____
- Other _____
- Other _____

2. Subject Traces

- a. _____
- b. _____
- c. _____
- d. _____
- e. _____

3. Photo Images

1552/8-1

- _____
- _____
- _____
- _____
- _____

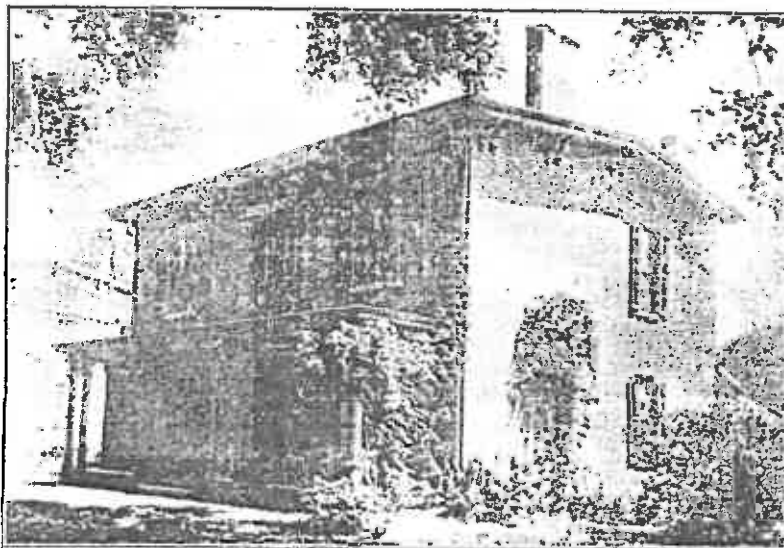
Iowa Site Inventory

Division of Historic Preservation
Iowa State Historical Department
26 E. Market St., Iowa City, Iowa 52240

Site Number 52-010-071
30-1418

Continuation Sheet

Item Number(s)



The Samuel Sharpless homestead, 412 N. Clinton

Samuel Sharpless (-1901) served for twenty-five years as the director of Johnson County Savings Bank, and was a noted local capitalist.

(Aurner, History of Johnson County, Iowa (Cedar Rapids, Western Pub.Co., 1912 pp. 687-88)

Historic Review for 1133 East Court Street

District: Longfellow Historic District

Classification: Contributing

The applicants, Gosia and Adam Clore, are requesting approval for a proposed alteration project at 1133 East Court Street, a Contributing property in the Longfellow Historic District. The project consists of the removal of the synthetic siding and the installation of cement board siding, either covering or removing original siding where it exists, and reconstructing the front porch which is currently enclosed.

Applicable Regulations and Guidelines:

4.0 Iowa City Historic Preservation Guidelines for Alterations

4.1 Balustrades and Handrails

4.4 Energy Efficiency

4.10 Porches

4.11 Siding

4.14 Wood

7.0 Guidelines for Demolition

7.1 Demolition of Whole Structures or Significant Features

10.0 Secretary of the Interior's Standards for Rehabilitation

Staff Comments

This house was built ca. 1910-1924 as a Foursquare with a low-pitched hip roof, flared eaves, and dormers. The dormers have paired windows. The windows in the main floors of the house appear to be one-over-one double hung windows. The porch was enclosed with combination windows about 1972. A 2-story rear addition was added in 1998. The house is clad in aluminum siding which was likely installed during one of these projects.

In 2005, the Commission approved changes to the rear deck built in 1998. In 2013, the Commission approved the installation of skylights in the south (rear) portion of the hip roof and the replacement of the vinyl deck railing with wood. Earlier in 2020, staff approved the replacement of the roof shingles, the replacement of the porch roof membranes, the installation of a railing on the second-floor rear porch and the removal of the aluminum siding at the front porch. Replacement and repair of deteriorated material to match the existing was included while the porch redesign would need to be approved by the full Commission.

Current Project Description

The applicant's original application in April proposed removing the aluminum siding and installing fiber cement board over any original siding underneath. The rear portion around the 1998 addition is assumed to have no siding underneath the aluminum. The siding and windows would be removed from the front porch and it would be reconstructed as an enclosed porch with column details and other associated trim. At one point, during discussion, the applicant suggested that a goal for the project was to remove all of the siding, trim, and sheathing to insulate the house. They have also suggested a desire to avoid lead contamination from the paint on the original siding. Finally, they have suggested removing all of the aluminum siding because of some derecho damage (that has not been documented so the extent is unknown) and installing new aluminum over the original siding.

The original application also included the addition of three windows to the rear in the Southwest corner. While the porch and siding has been discussed multiple times, the window portion of the project has not been discussed further and no other information has been provided. That portion of the original application is not included here. For approval, clarification of window location and product information would be required, including elevation drawings showing the windows.

Historic Preservation Guidelines

The guidelines begin the Alteration Section (4.0) with the following statement:

Alterations to both contributing and noncontributing properties, as well as landmarks, should be done in a manner that is appropriate to the style and age of the building, as well as its neighborhood context. The historic character and integrity of older buildings should be maintained by repairing historic components to the extent feasible and using traditional materials and techniques.

Section 4.1 Balustrades and handrails recommends constructing or replacing missing balustrades by using historic photographs or by choosing a style that is consistent with the architectural style of the building.

Section 4.4 Energy Efficiency recommends the following regarding insulation: “Insulate the attic, basement, and crawl space. About 20% of energy costs come from heat loss in those areas.” This section includes recommendations to seal gaps and use weather-stripping to prevent heat loss. It also recommends repair and material reuse to prevent unnecessary landfill waste.

In Section 4.10 Porches, the guidelines recommend repairing historic elements to retain them, and “replacing badly deteriorated elements with those that match the historic components in design and material.” Porch floors would be vertical-grained Douglas fir porch flooring (which is tongue and groove). “Porch skirting must be added to fill the space below the porch floor porch between piers if the space is 18 inches or greater. It is disallowed by the guidelines to “enclose front porches with permanent windows or walls.” According to the guidelines, “porches are the focus of many historic buildings and help define their overall character. In historic residential neighborhoods, front porches help to establish a sense of community. Front porches and sun porches should be preserved for both their architectural and social value.”

Section 4.11 Siding recommends “replacing deteriorated sections of wood siding with new or salvaged wood siding that matches the historic wood siding.” It is also recommended to remove “synthetic siding and repair historic wood siding and trim.” It is disallowed to “remove historic trim pieces such as door and window trim, skirt and frieze boards, and corner boards.” “Matching synthetic siding may be used to repair damage to small sections of existing synthetic siding.” Fiber cement board with a smooth finish is often an appropriate substitute for wood. This section also begins with an opening statement:

“Wood siding along with the trim details and a variety of paint colors combine to make one of the most important defining characteristics of historic districts. This display of detail and color is essential to the character of the older neighborhoods, and therefore siding is protected by the design guidelines.

The primary threat to the traditional appearance of older neighborhoods has been the application of synthetic siding. This has been installed in an effort to avoid periodic painting. While synthetic siding may last longer than an application of paint, it does deteriorate over time and does need to be replaced when it fades, cracks, dents, or deteriorates. The application of synthetic siding covers many architectural details of a building, damages the historic siding and trim, traps moisture within the walls, and in some cases, necessitates the removal of historic elements altogether. For all of these reasons the covering of historic properties with synthetic siding is not allowed.”

Section 4.14 Wood says it is disallowed to “cover original wood siding, soffits, and eave boards with another material...” It should be noted that section 4.9 Paint and Color includes many of the common practices for safe removal of lead paint.

Section 10, Secretary of the Interior’s Standards for Rehabilitation includes Standard 2 which says, “the historic character of a property shall be retained and preserved. The removal of historic materials or alteration of features and spaces that characterize a property shall be avoided.” Standard 3 says: “each property shall be recognized as a physical record of its time, place and use. Changes that create a false sense of historical development, such as adding conjectural features or architectural elements from other buildings, shall not be undertaken.” Standard 6 says “Deteriorated historic

features shall be repaired rather than replaced. Where the severity of deterioration requires replacement of a distinctive feature, the new feature shall match the old in design, color, texture, and other visual qualities and, where possible, materials. Replacement of missing features shall be substantiated by documentary, physical, or pictorial evidence.”

Historic Review

This property currently includes two conditions which are disallowed by the guidelines, are currently grandfathered-in, and are the subject of this application: the aluminum siding and the enclosed front porch. Both situations may continue to remain with the approval of minor repairs indefinitely. The appropriate sections of the guidelines include specific recommendations on minor repairs.

Siding

When aluminum or steel siding is damaged by a storm, repair can follow the guidelines by tooting-in new siding in damaged areas, allowing the disallowed condition to remain. If the siding is no longer manufactured, it is often possible to find an approximate match or to move siding from one area to patch and residing its original location with new closely matching siding. One of the persistent barriers in matching synthetic siding is color. The original color will fade and crack over time, requiring maintenance. Steel and aluminum can and should be painted when the material fades. In an effort to reduce landfill waste, it is also a more sustainable solution than replacement. Painting will also allow a closely matching repair to blend with the rest of the house. Finally, repair and repainting will allow a house to maintain its synthetic siding following a storm or similar event because it meets the guidelines. New installation of synthetic siding on the entire house is disallowed by the guidelines. For this reason, staff recommends that storm damage is repaired following the guidelines by installing new or reclaimed material that matches as close as possible (lap-size and texture) and is painted as necessary.

The guidelines recommend the removal of aluminum siding and the repair of the original siding and would also be the solution if aluminum siding was pervasively damaged. Where the original wood siding is heavily deteriorated, using new or reclaimed material to match the existing is recommended. The goal of the guidelines is to remove inappropriate materials and to repair, and return to use, the original material, exposing the original character and architectural details. The guidelines are clear that it is disallowed to remove original siding and trim unless it is deteriorated to be replaced with matching material. Covering original wood with synthetic material can damage the original material in the installation process and over time as moisture is trapped in the wall. Installing lap siding such as cement board over original siding would lead to increased damage to the original material because of the increased use of fasteners across the length of the material (as opposed to the periodic or edge fasteners used with most synthetic siding).

Installing a material such as cement board over original siding also changes the relationship between the siding and trim and openings. One of the uses of trim is to bridge gaps between materials and at corners created by changes in depth or direction of the wall plane. While trim does not prevent water from entering the wall, it helps to direct water away. Aesthetically, trim is among the most important elements of the historic character of the building. It emphasizes elements and marks transitions. It creates a hierarchy of architectural elements. Adding a siding layer to the outside of a historic house alters all of these relationships. Gaps may be created where they didn't exist. Openings and their trim may appear more recessed than intended. Staff would not recommend approval of the application of another siding over the original siding on a historic house because it is disallowed by the guidelines, will damage the original material and impact the historic character of the building.

It should be noted that removing all siding and trim on a historic house is not appropriate according to the guidelines even when the goal is to install insulation. In addition to reasons mentioned above, wholesale removal would likely damage previously undamaged pieces. Reinstallation of the original material would lead to permanent changes. Replacing this material with new, when it is not deteriorated is disallowed by the guidelines and would create unnecessary waste. The application of insulation in historic wood frame, plaster-walled residential construction is considered controversial in preservation literature. Unless the process includes the installation of a vapor barrier between the plaster and the stud-wall, moisture from the interior of

the house can migrate into the wall cavity where it will condensate making the new insulation wet. This insulation can never dry out. This moisture trapped in the wall system can lead to the failure of the plaster but most often leads to a failure of the siding so that paint cannot adhere properly and fails. Rigid insulation installed between siding and sheathing will change the exterior details as discussed above. It also requires an air space between the insulation and the siding, further increasing the depth of the wall cladding. When homeowners want to increase the energy efficiency of historic homes, the guidelines and historic preservation sources recommend insulating attic floors and basements as well as sealing air gaps and applying weather-stripping. Wall insulation typically does not provide enough benefit to outweigh the cost and damage that can be incurred. A plaster and lath stud-wall system with board sheathing has a greater thermal mass than modern stud-wall system with sheetrock, making wall insulation less beneficial in a historic house. The attached document, "Energy Efficiency in Historic Homes" was created by Heritage Works for the city of Dubuque and discusses historic home energy efficiency in our local climate. The attached article by well-known preservationist, Bob Yapp, "Myths About Insulating Old House Walls" discusses insulation and these issues. Staff would not recommend approval of the removal of original siding and trim from a historic house unless it is deteriorated beyond repair.

Porch

For this porch, the porch piers, floor, and roof are most likely the only original remaining elements. The applicant's removal of the aluminum siding and windows is recommended by the guidelines. The guidelines further recommend that the porch is rebuilt either following photographic evidence, of which we have none, or as is appropriate to the architectural style, location and date of construction. Adding conjectural features that are not supported by this evidence could create a false sense of history and should be avoided. Since the house does not exhibit any evidence of overly elaborate trim details and it is a Foursquare built when Craftsman details were more popular than Queen Anne details, porch elements such as turned spindles and a spindled architrave (frieze board) would not be considered appropriate.

Staff has reviewed properties similar to 1133 Court in an attempt to evaluate potential porch details to model for the reconstruction of its porch. Some of the architectural features which were compared are noted on the attached photos. While houses in the Northside neighborhoods were also reviewed, it was determined that Court Street had a large number of Foursquares with a wide variety of Architectural details so that the review could be very localized. While a significant number of these houses had an arched frieze board, there are others with a more simple, straight frieze board. Staff finds that while an arched frieze board could be supported if the applicant's wished, it would not be considered the only appropriate configuration. The number of columns also varies between two and three. In the cases where three exists, the porch stairs are framed on the inside by a half-column or tall pier. Since the two-column design is structurally more expensive and no more appropriate than the three-column version, staff supports the three-column design. Staff further finds that the porch columns and balustrade at 1152 Court Street is the most appropriate model for the porch reconstruction at 1133 Court. Several details in other properties staff does not find appropriate here, such as battered (sloped) columns, thinner proportions, and overly ornate balustrades. They are shown in the attached photos.

Staff does not recommend approval of a porch reconstruction with permanent walls and windows because it is disallowed by the guidelines. The current enclosure will be entirely removed so it will no longer be grandfathered-in. The roof and floor, as original materials, should remain unless deteriorated beyond repair. Similar to other properties on Court Street, the applicants could construct the porch to mimic 1152 Court Street and install screens and storm windows. Screens and storm windows are not regulated and can be installed and replaced without approval. Only permanent walls and windows are disallowed but the guidelines. The porch at 1152 Court Street provides an example of a historic porch construction that could be partially enclosed, while still meeting the guidelines. Staff recommends approval of a porch reconstruction that mimics the porch at 1152 Court, does not remove original materials unless deteriorated, and is not permanently enclosed.

Recommended Motions

(Motions must be made in the affirmative and then voted down if the application is being denied.)

Siding removal: Move to approve a Certificate of Appropriateness for the project at 1133 East Court Street, removing the aluminum siding and either including the removal of the original siding and trim without regard to its condition or the installation of new siding over the original siding.

Siding repair: Move to approve a Certificate of Appropriateness for the project at 1133 East Court Street, removing the aluminum siding and repairing the original siding and trim, replacing deteriorated or missing pieces, with wood, smooth cement board or smooth LP Smartside, any of which will match the original.

Porch reconstruction: Move to approve a Certificate of Appropriateness for the porch reconstruction project at 1133 East Court Street as presented in the staff report with the following conditions:

- The new porch will mimic the porch at 1152 East Court Street
- The new porch will not be permanently enclosed
- All materials will be wood or approved by staff and Chair

1133 Court Street



- Dormers with paired windows
- Flared eaves
- Wide eaves
- 2nd floor window pattern one in each corner
- Small window
- Projecting bay



Porch roof original here with low slope and wide eaves



Fewer windows
this side 2nd floor
not sure if orig.

Mid-flight stair
window

Small window
at base of stair



This house has three porch piers. Uncertain if the center one had a full-height column or not. Also not sure if the middle one is centered or off-center to help frame the entrance on the inside of the porch. The stairs and brick sidewalls are not original, do not match other brick on the house and don't fit properly between the piers so they were likely installed when porch enclosed.

1152 Court Street



This house is similar but lacks the flared eaves. It has a similar window patterning and is not much older than 1133 Court. This house does have a bump-out on both sides instead of one. The porch has square, paneled columns with minimal capitals and bases. The balustrade is also paneled and an appropriate height if there are no code requirements for increased height. This example is the same width as 1133 Court and has three columns. The screens are protected around the storm door by a simple square spindled balustrade that requires only a minimal post hidden by the door framing. This type of porch construction provides a historic example that would also avoid more elaborate detail requiring photographic evidence. In Iowa City it could be considered to be very common detailing for a house of this style and era.



Another view of the house at 1152 Court



1120 Court Street is a house with pronounced and even unique detailing. It would not be considered appropriate to mimic details such as this in a porch reconstruction without photographic evidence that the house originally matched it. Adding this type of detail would create a false history and undermine the uniqueness of this design where it is original.



This porch design is similar to 1152 Court Street but is not as good of an example for the porch reconstruction at 1133 Court. Staff does not know where this house is located or its age and style. The photo shows that it is a one or 1 1/2- story house and is more narrow than 1133 Court. This house also has exposed rafter tails and a gable on porch roof. The trim on the columns appears wider than 1152 Court. The panels of the balustrade and columns are both segmented unlike 1152 Court.



HERITAGE
WORKS



ENERGY EFFICIENCY IN HISTORIC HOMES

Guidelines for increasing comfort, saving money,
and preserving historic character



Your home is not just a roof over your head.

It should be a pleasant, inviting environment, and a place of privacy, comfort and enjoyment. For many, their home is also their most valuable asset; the result of years of savings and hard work. Protecting that investment is extremely important.

Protecting one's investment in a historic home brings along unique challenges. People choose to live in historic homes for a variety of reasons. In popular culture, historic homes are viewed as icons of the "American Dream," with the white picket fence, the front porch swing and the cozy hearth in the living room. Historic homes were built to last, incorporating expert craftsmanship and durable materials. No two historic homes are alike. Each has its own character and identity.

But historic homes also have the reputation of being energy inefficient and difficult to maintain. They are thought to have drafty windows, high maintenance building materials and small, compartmentalized rooms. In today's world, people have expectations for comfort and livability that are different from those of the original builder.

As a result, it is expected that an owner of a historic home will want to modernize his or her home and enhance its energy efficiency. However, it is important that the homeowner be aware that upgrades and alterations can be accomplished in a way that increases comfort, saves money and preserves the historic character of the home.

This publication is a resource for owners of historic homes when they are considering options for upgrading and enhancing the energy efficiency of their homes. It outlines an easy-to-follow process that can assist the homeowner in both assessing their home and determining which strategies make sense in enhancing energy efficiency.



A Historic Home's Character is Valuable

A historic home's character adds value to the overall worth of the property. It is likely a one-of-a-kind design and incorporates materials that are unique, durable and nearly impossible to replace. Enhancing your historic home's energy efficiency will add to its overall value. However, if the energy efficiency enhancements destroy or impair historic character in the process, it is possible that property value may decrease. With proper planning, energy efficiency upgrades to historic homes can be accomplished without negatively impacting historic character, maximizing property value.

HISTORIC HOMES ARE INHERENTLY ENERGY EFFICIENT

It is often said that “the greenest building is one already standing.” But what does that mean when it comes to a historic home? Most homes built in the 1800s and early 1900s were designed and built without central heating and cooling systems. They were constructed to retain as much heat as possible in the winter months and remain as cool as possible in the summer months. If done correctly, energy efficiency upgrades that incorporate a historic home’s inherently efficient design will result in a home that can be just as energy efficient as a new home.

Historic homes represent an accumulation of energy that went into extracting the raw materials, manufacturing the building products and constructing the home (also known as “embodied energy”). Maintaining a historic home and its materials saves the embodied energy inherent in the home. Choosing not to demolish the historic home to build a new home also saves energy expended in demolition and the embodied energy expended in building a new home. Additionally, maintaining a historic home keeps its building materials out of the landfill.

ASSESSMENT, THEN INVESTMENT

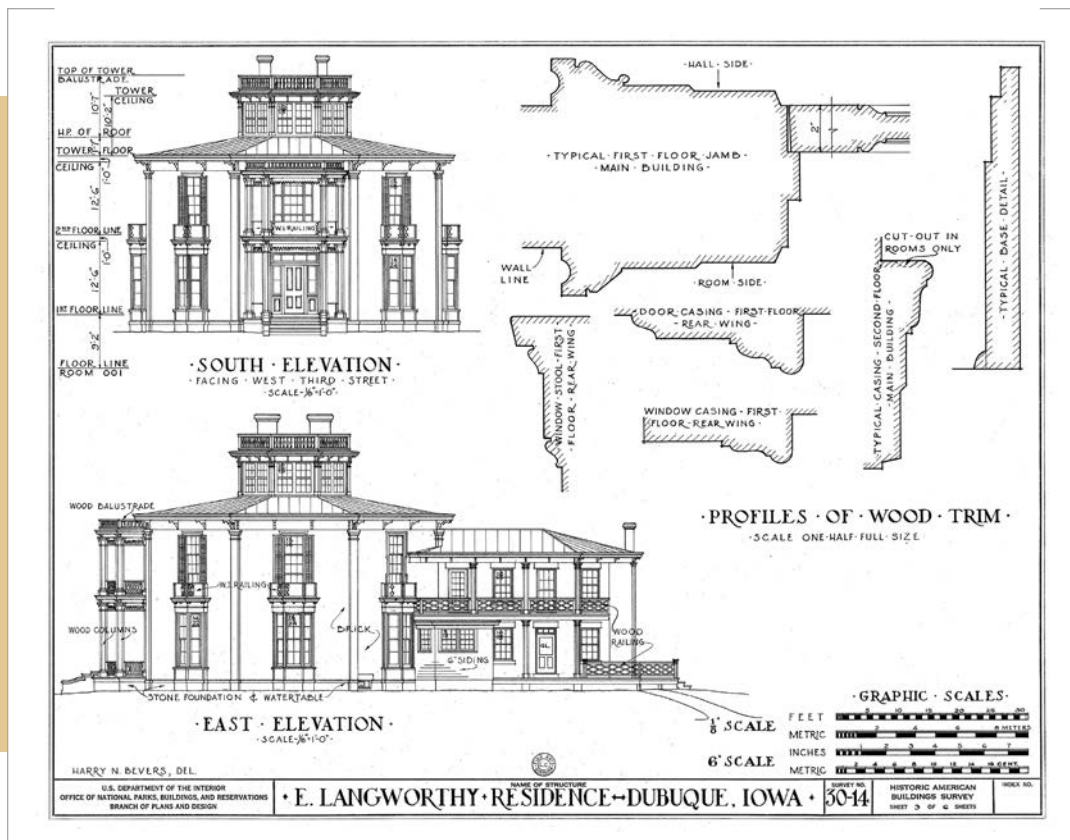
The goal of any historic home energy enhancement project should be to incorporate cost effective solutions while retaining the home’s historic character and value.

Before a homeowner begins any energy efficiency improvement project it is vitally important that:

- 1 The home’s historic character defining features are assessed and documented;
- 2 The historic home’s energy efficient design features are noted; and
- 3 A baseline of the home’s current energy usage is established by an energy audit.

Only after these assessments are complete should the homeowner begin energy enhancement investments.

Knowledge saves time and money!



A historic home has unique character. Assessing your home’s historic character before doing any work will minimize potential adverse impact on the homes historic features.

1

Assess your Home



What gives your home its character?

- Architectural style
- Windows and doors
- Chimneys
- Trim and detail
- Brick and stone
- Woodwork and plaster



Does your home have inherent energy efficient features?

- Existing storm windows and doors
- Porches and awnings
- Solid masonry
- Shade trees



What is your home's current energy use?

- A professional energy audit guides energy improvements
- An energy audit will establish a baseline that will help measure the effectiveness of energy enhancements

Knowledge saves
time and money.

Making your home energy efficient while retaining its historic character enhances comfort, saves money and increases value

2

Enhance your Home



Reduce the Use

- Passive heating and cooling
- Appliances and lighting
- Programmable thermostat
- Close off unused rooms
- HVAC tune-up
- Use powerstrips



Seal the Envelope

- Seal gaps with caulk and weather stripping
- Fireplace and flue
- Add insulation
- Window and door repair



Upgrade!

- Add or replace appropriate storm windows and doors (exterior or interior)
- Replace boiler/furnace with an Energy Star model
- Add solar or geothermal power



ASSESSING A HOME'S HISTORIC CHARACTER

People are drawn to historic homes because of their unique features, distinctive character and charm. Character refers to the mixture of visual aspects and physical features that comprise the appearance of a historic home. Before doing any work on a historic home, it is important to identify the home's character defining features.

There is a simple 3-step process to assist in identifying a home's character-defining elements.

STEP 1

Identify the Overall Visual Aspects of the Home

- Architectural style;
- Shape, setting, environment;
- Roof and features (cupola, chimney, dormer);
- Projections from the house, such as porches and bay windows;
- Window and door openings (pattern, size, type); and
- Materials (brick, stone, wood, etc.).

STEP 2

Identify the Exterior Details

This step involves examining the home at close range:

- Surface quality of materials (texture and color); and
- Surface evidence of craftsmanship or age (evidence of hand-tooling of stone, hand-carved wood or stone, unique mortar joints).

STEP 3

Identify the Visual Character of Interior Spaces, Features and Finishes

- Spatial arrangements: How does the interior flow?
- What are the unique features of the interior? (mantels, light fixtures, moldings and casings, staircases, etc.)
- Are there any unique surface finishes? (parquet floors, pressed metal ceilings, grained doors, stencil painting, hand painted murals, etc.)



CHARACTER DEFINING HISTORIC FEATURES 1192 LOCUST STREET, DUBUQUE

- ITALIANATE ARCHITECTURAL STYLE
- BRICK MASONRY CONSTRUCTION
- BELVEDERE CUPOLA
- WIDE EAVES WITH WOOD BRACKETS
- WOOD ONE-OVER-ONE DOUBLE HUNG WINDOWS WITH LIMESTONE SILLS AND LINTELS
- WOOD PORCH WITH DECORATIVE BRACKETS AND COLUMNS



INHERENT ENERGY EFFICIENT DESIGN

Most homes built before World War II have numerous features designed to retain heat in the winter and expel heat in the summer. With the widespread adoption of central heating and cooling in the mid-20th Century, many of these features were either forgotten or altered. With knowledge of a home's inherent energy efficient design, a homeowner can incorporate existing efficiencies into planned energy efficiency enhancements. Design features to look for include:

Site Orientation

- More intensely used spaces are oriented to the south and west, to maximize natural light and heat gain in the winter.
- Deciduous trees provide shade in summer but admit winter sun when leaves have fallen.
- Evergreen trees provide year-round windbreak

Roof Overhangs

Large overhangs keep high summer sun off the walls while admitting the lower winter sun.

Porches

Provide summer shade and sheltered outdoor living space.

Massive Masonry Walls

- In winter, masonry absorbs heat from the sun during the day, releasing it at night.
- In summer, masonry absorbs heat from the sun slowly, so the interior stays cooler than midday exterior temperature. Stored heat is released at night when its cooler.

Transoms

Provide natural light to hallways and vestibules.

Skylights, Clerestories and Dormers

Provide natural light and ventilation to top floor interior spaces.

Storm Windows

Provide additional protection from elements during winter months and prevent air infiltration.

ENERGY EFFICIENT DESIGN FEATURES

975 KIRKWOOD STREET, DUBUQUE



TREES FOR SUMMER SHADE

ATTIC VENTILATION FOR SUMMER COOLING

LARGE, DEEP EAVES FOR SUMMER SHADE

WOOD STORM WINDOWS TO MINIMIZE AIR FILTRATION

SOUTH FACING PORCH FOR SHADE AND OUTDOOR LIVING IN SUMMER



ASSESSING A HOME'S ENERGY PERFORMANCE

Many utility companies offer homeowners a free energy audit. It's always a good idea to schedule a utility company's energy audit before you start any work to make sure you pre-qualify for available rebates.

In Dubuque, both Black Hills Energy and Alliant Energy offer a free basic energy audit. Depending on what you learn from the free energy audit, it could be important to also hire a professional energy consultant to help guide your planning process for energy upgrades.

A professional energy consultant should be able to provide an analysis of your current energy use and make projections about energy savings from improvements to your home. You should look for someone certified by BPI (Building Performance Institute) or RESNET (Residential Energy Services Network).

Comprehensive energy audits (often called "Home Performance Assessments") should include diagnostics performed with a blower door, infrared camera, and gas analyzer. The blower door test will determine how leaky the home is and potential savings that could come from air sealing work. The infrared camera can see into the walls and identify areas that are missing insulation. The gas analyzer will check for any gas leaks and detect for potential carbon monoxide issues that could be a health and safety problem.



WHAT IS A "HOME PERFORMANCE" ASSESSMENT?

This type of assessment goes beyond just looking at energy issues in a house. Your house is a "system" with many interactions. Some energy improvements (like insulation) have the potential to increase hazards like moisture, carbon monoxide, and radon. A Home Performance Assessment will cover health and safety issues in addition to energy efficiency. Look for someone with professional certifications like BPI or RESNET.



The following chart shows an example of annual utility costs broken down for a typical 1,800 square foot house:

ELECTRICITY USE	
Air conditioning	\$200
Lighting	\$200
Clothes washer	\$200
Refrigeration/freezer	\$150
Television/cable/DVR	\$150
Computers	\$100
Dishwasher	\$100
Other electronics, etc.	\$100
Annual Electricity Cost:	\$1,200
NATURAL GAS USE	
Furnace	\$650
Water heater	\$250
Stove, dryer, etc.	\$100
Annual Natural Gas Cost:	\$1,000
TOTAL ANNUAL UTILITY COST:	\$2,200

The energy consultant may make upgrade recommendations that not only save a significant amount of energy and money, but also qualify for generous rebates from your local utility. Be sure to check your utility's website for the exact rebate amounts on upgrades like:

- Increased levels of insulation and air sealing work
- A new high efficiency furnace and/or air conditioning system
- A new water heater
- A new washing machine
- New LED lighting

In addition to advising you on energy improvements, a good consultant will also make sure you are aware of potential problems that could arise from making improvements. For example, some common recommendations might include:

- Addressing moisture issues in your basement
- Replacing knob and tube wiring before adding insulation
- Adding a powered vent to your water heater
- Adding a radon mitigation system

Use the information from your Home Performance Assessment to make the simplest efficiency improvements first.

Home Energy Score

Score

Home Facts

Recommendations

Address: **12345 Honeysuckle Lane
Smithville, AR 72466**

Home size: **1,800 square feet**
Year built: **1970**
Air conditioned: **Yes**

Your home's current score **3**

Score with improvements **7**

Estimated annual savings **\$411**



There are a variety of energy audit reports used by utilities and energy consultants. The U.S. Department of Energy has developed a report called the "Home Energy Score" that can help guide homeowners in their upgrade decisions.



REDUCE THE USE

COMMIT TO ENERGY SAVING BEHAVIORS

There are a number of energy efficiency strategies that can be implemented for little cost and without impacting a historic home's character. You may already be doing some of these!

Utilize your programmable thermostat

According to the U.S. Department of Energy, you can save as much as 1% for each degree setback for a period of 8 hours. If you adjust your thermostat in the winter from 70 degrees to 66 while you're sleeping or at work, you can save about 4%.

Shut things off completely

Everybody knows they should shut their lights off when they leave a room, but many electronics don't completely shut off unless you actually unplug them. However, using a powerstrip is just like unplugging. Connect your television, cable box, and video game machine to a powerstrip and turn it off every night.

Take advantage of passive heating and cooling

Many historic homes were designed with operable transoms for natural ventilation when it gets warm. Ceiling fans help circulate air really well, too. When it gets cold, heavy drapes or blinds can cut down convective currents near windows. Make sure the windows are clear again to let through the warmth of the sun.

Care for your heating and cooling systems

Regular maintenance of your furnace and air conditioner can save you money while prolonging the life of the equipment. Be sure to change out your furnace filter on a regular basis. Clean your air conditioner's outside unit at least once a year by removing debris and spraying it down with a hose. Have a professional tune up your furnace and air conditioner before each season.

Close off unused rooms

Sometimes there are rooms that don't need to be heated and cooled as much as the rest of the house and can be closed off to save you money. However, it's important to keep your heating and cooling system properly balanced so consult a professional before just closing off all the vents in a room.

With a Wi-Fi thermostat you can control your heating and cooling from the palm of your hand and save money on your utility bills.

COMMIT TO MAKING LONG-TERM INVESTMENTS IN YOUR HOME

If your home is a hundred years old, chances are it is going to be around for another hundred years.

Pay special attention to the envelope

The "envelope" of your house is anything that is part of the barrier between inside and outside. Investments you make in envelope improvements like insulation and air sealing can reap rewards for many decades of energy savings and comfort. But beware of poorly designed solutions that can lead to mold and rot and contribute to unhealthy indoor air quality.

Use durable, traditional materials

Old growth wood, hardwoods, granite, slate, and terrazzo are all materials that add value to your home and last a long time, saving you money on replacement costs. Avoid removing old growth wood trim and replacing it with short-lived, wide-grained contemporary wood or vinyl. Especially consider restoring historic wood windows rather than replacing them with new windows.

Invest in high-efficiency equipment

High-efficiency equipment may be more expensive to purchase but will save you more money in the long run. Look for ENERGY STAR rated equipment and appliances. Rebates are typically better for higher efficiency equipment as well. Once you improve the envelope you may be able to replace the heating and cooling systems with smaller units that are less expensive to purchase and operate.





SEAL THE ENVELOPE

The biggest source of energy loss in most homes comes from “conditioned air” (air that has been warmed by a furnace or cooled by an air conditioner) escaping to the outside.

While many people immediately think of a drafty window or door, the majority of air is actually escaping through the attic. Most attics are intentionally vented so the air that’s moving from the house to the attic just flows right outside. A big part of what’s happening is called the “stack effect.” Air is coming into a house through a “leaky” basement and pressure caused by the stack effect moves that air upwards and out of the house through the attic.

Air Sealing

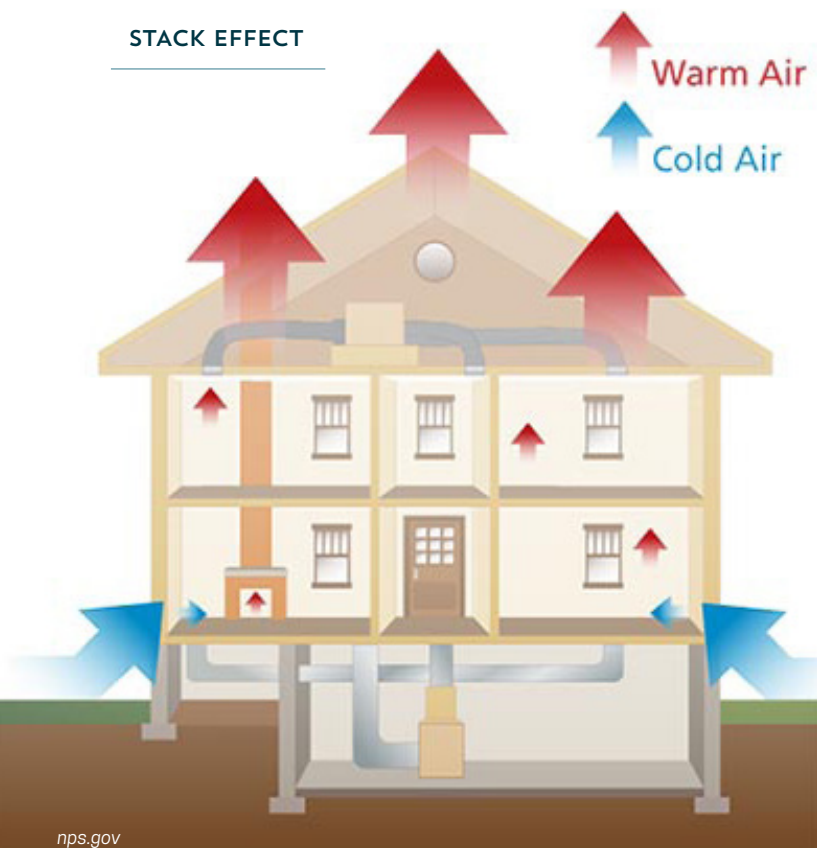
The best way to solve the problem of a “leaky house” is to seal all the cracks and openings in both the basement and the attic. This slows

down the stack effect and keeps conditioned air from escaping. The most common tool for doing this work (called “air sealing”) is a can of spray foam like Great Stuff. Larger openings can be blocked off with pieces of rigid foam. While you can tackle some of this work yourself, a professional contractor typically uses a blower door to accelerate the air flowing through the house to find all the holes to be sealed.

Common areas that need air sealing:

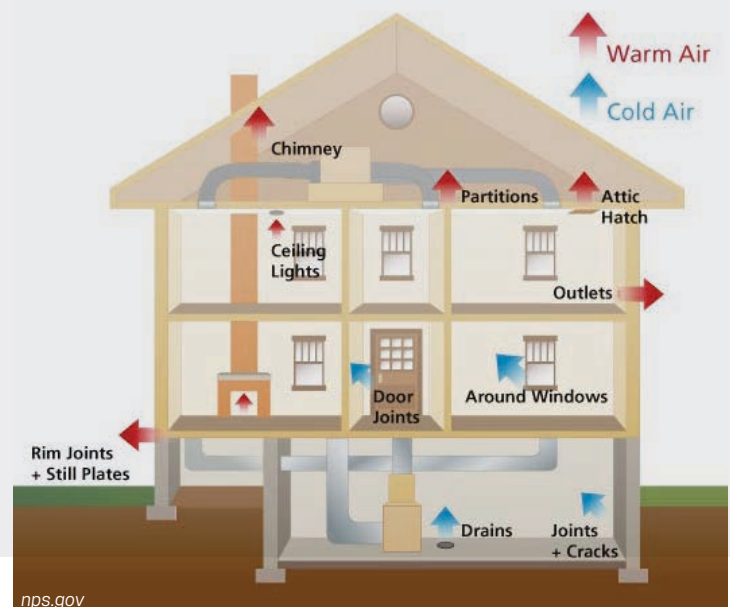
- Large openings in the attic along the outside walls
- Chimney through the attic (be sure to use appropriate materials on heated surfaces like chimneys)
- Attic hatch or entrance
- Can lights open to the attic
- Ductwork and piping penetrations in both the attic and basement
- Area along the top of outside basement walls (called sill plates)
- Outlets and switches
- Windows and doors

STACK EFFECT

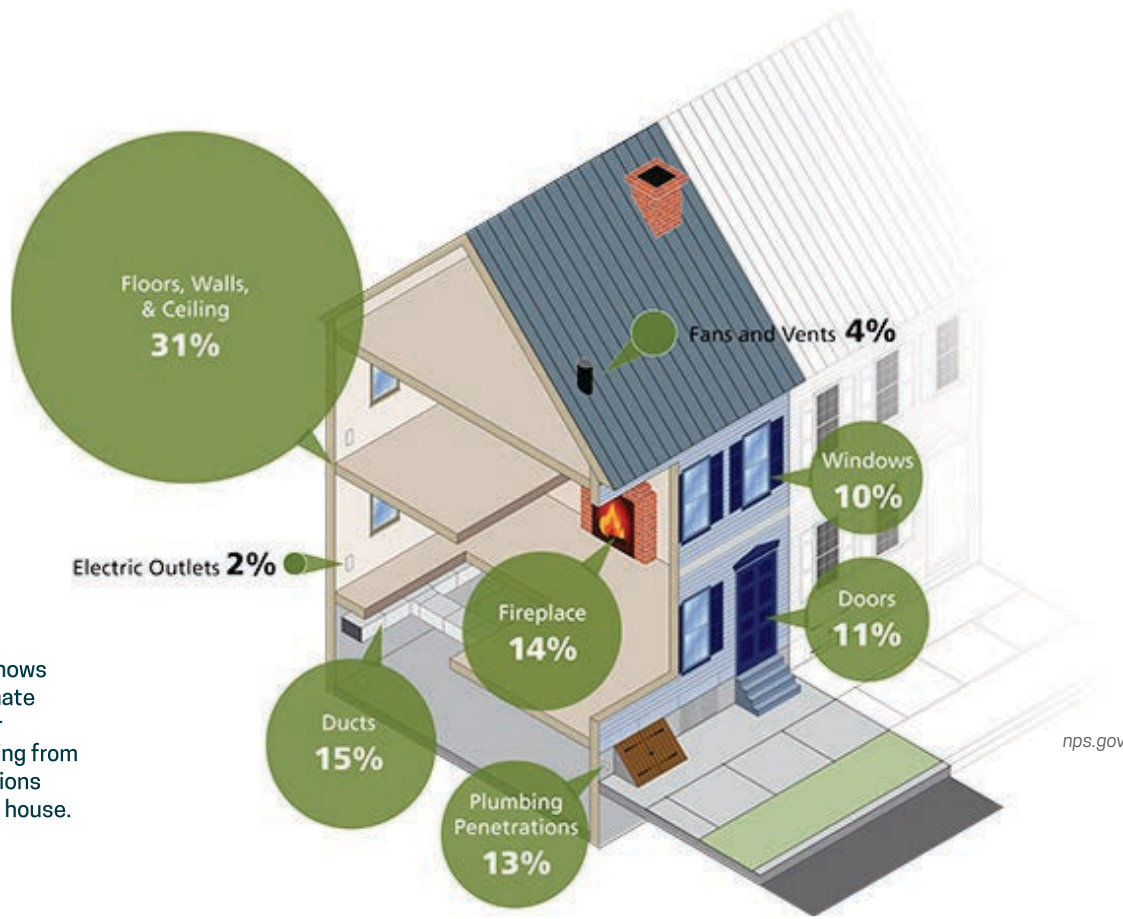


nps.gov

INFILTRATION



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nps.gov

This image shows the approximate amount of air leakage coming from various locations throughout a house.

Insulation

Insulation is also critical for heat loss, of course. It just isn't as effective if air is zipping around it through holes that need to be sealed. You can tell this is happening in areas where you see dirty insulation (it's working like a filter to catch the dirt while the air is just moving through it). Once the air leaks have been sealed, it's time to focus on improving the insulation levels.

Most historic homes were not originally insulated, so if there is currently insulation it was added much later. The current code requirement for attic insulation in new homes in a cold climate is R-49. This is most easily achieved by blowing in 15–18 inches of cellulose or fiberglass insulation. Insulation in a basement can be a little trickier, and if you have moisture concerns, you may only be able to insulate the areas that are above ground level. Insulating walls can also be difficult or not possible if there is knob and tube wiring still in the walls. The most common method is to drill holes and blow in “dense-packed” cellulose. One of the advantages of this method is the added air-sealing qualities of dense-pack cellulose. Newer technologies such as

spray-foam insulation have become popular in new construction, but are not recommended in historic homes, as they can create moisture issues.

It is also important to insulate pipes and ductwork. If there is ductwork running through an attic it should be wrapped with a minimum of R-5 insulation. Hot water pipes in a basement should be insulated (all pipes should be insulated if there's any chance of freezing) and the water heater tank should also be wrapped in insulation.

The following table lists some insulation R-values per inch for popular insulation materials:

INSULATION TYPE	R/INCH
Fiberglass batts, blown, board	2.4 - 4.4
Cellulose blown	3.0 - 3.6
Mineral wool batts, blown, board	2.4 - 4.4
Vermiculite or perlite	2.3 - 2.7
Expanded polystyrene (white)	3.6 - 4.2
Expanded polystyrene (blue/pink)	5.0
Polyisocyanurate board	5.6 - 7.6



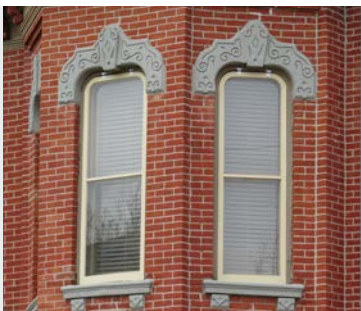
Window Restoration

Original wood windows are the soul of a historic home. They are often the most important character-defining elements of a home. Typically made of old-growth lumber that is rot resistant, historic wood windows were built to last hundreds of years. Unfortunately, historic wood windows are often the first casualties of a poorly planned historic home rehabilitation project. As a result, historic character is irretrievably lost for little or no economic savings.

REPLACE HISTORIC WOOD WINDOWS ONLY AS A LAST RESORT

Homeowners often believe that just replacing their original single pane windows with new double pane windows will result in significant energy savings. However, studies have shown that only about 10-15% of a home's energy loss is through its windows. The U.S. Department of Energy estimates that windows are responsible for only 25% of a home's heating bills. Window replacement is one of the more expensive home renovation projects. Depending on the cost of a window replacement project, the National Trust for Historic Preservation estimates that the average payback period for replacement windows is 40 to 250 years. The average lifespan of a replacement window is about 20 years, far shorter than the payback period. Window replacement is usually a bad investment for a historic homeowner.

The greenest windows are the historic home's original windows. A good storm window combined with a restored single pane window is very close to the insulation value of a new double pane window.



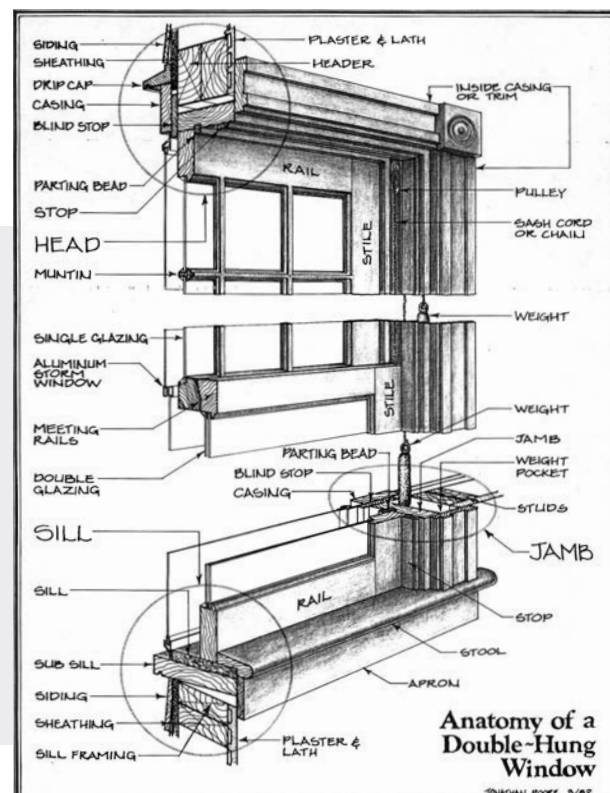
Windows are often the most important character defining feature of a historic home. A restored window with properly installed storm can be just as energy efficient as a new window.

What's more important for windows is that they are working properly and sealed to prevent drafts and moisture. Saving historic windows keeps their materials out of the landfill and saves the embodied energy both in the original window and that expended in the construction and transport of the replacement window.

When considering what to do with historic windows, all owners of historic homes should first consider restoring their original windows. There are many advantages to restoring instead of replacing your original wood windows:

- The original wood is much higher quality and long-lasting than wood used to manufacture windows today.
- Wood windows were constructed to be repaired. If one component fails, it can be repaired or replaced. If a component of a replacement window fails, the entire window must be replaced.
- Wood windows can be retrofitted with weather stripping, which increases the energy efficiency of the window.
- The cost of properly restoring original wood windows is usually less than the cost of new windows.
- The historic character of the home will be preserved.

When original windows **MUST** be replaced, be sure to choose a style and material that complements the home's original design.





UPGRADE!

Once you've sealed the envelope, it's time to consider upgrading the other energy consuming systems in your home.

Furnace

Especially in a cold climate like Dubuque, the furnace is the most important system to address. Forced-air, natural gas furnaces are the most popular and cost effective heating systems in this area. If your furnace is older than 12 years and not a high-efficiency (sealed combustion) furnace, you should consider replacing it. You should also make sure to consider improvements to the ductwork which can result in both significant energy savings and more consistent temperatures throughout the house. A professional energy consultant can help recommend the best improvements in this area.

Geothermal

Another highly energy efficient heating source to consider is a geothermal system. These systems are all-electric and provide both heating and cooling. Some important factors when evaluating a geothermal system:

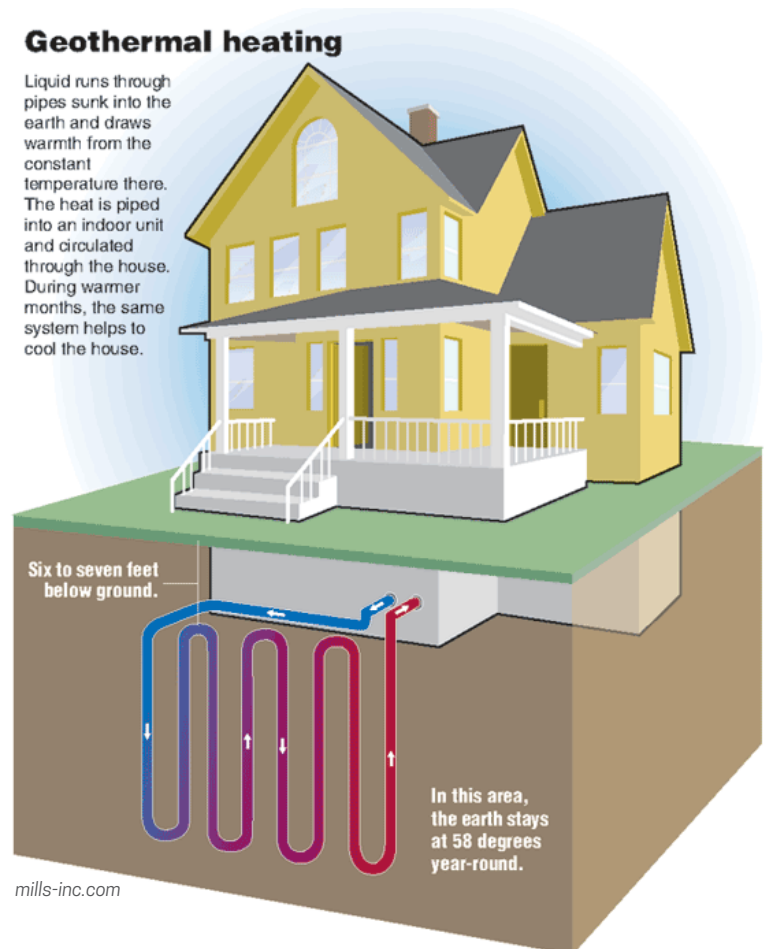
- Must have a tight, well-insulated house for it to be effective
- Must have a good area on property to drill the wells (not too rocky)
- Current air conditioning system is near end-of-life in addition to furnace
- Convert all gas-fired appliances to electric to eliminate gas bill completely



A high-efficiency furnace includes a sealed combustion area that uses PVC piping for air intake and exhaust as shown in this photo.

Geothermal heating

Liquid runs through pipes sunk into the earth and draws warmth from the constant temperature there. The heat is piped into an indoor unit and circulated through the house. During warmer months, the same system helps to cool the house.





Water Heater

Water heaters are another significant source of energy use. Like furnaces, natural gas is the most popular and cost effective fuel for water heaters in the Dubuque area. On-demand (or tankless) water heaters are more efficient than standard tank water heaters. One reason for this is that there are no “standby losses” from hot water sitting in a tank for long periods of time before it’s used. If you were trying to go all-electric, a high efficiency option is a heat pump water heater that transfers energy from the surrounding air to the water in the storage tank.

Lighting

Compact Fluorescent Lights (CFLs) were a popular energy saving choice for many years, but LEDs are now the preferred type of energy efficient lightbulb. If your house is still filled with incandescent bulbs you will see a dramatic savings from converting to LEDs. An equivalent 60 watt bulb uses only 10 watts which means a savings of over 80%. LEDs also last much longer, with estimated life-spans up to 20 years. In recent years, the cost to purchase these blubs has decreased significantly, and there are many more options to choose from.

Appliances

The main appliances you should consider for energy savings potential are your refrigerator, clothes washer, and dishwasher. Always look for ENERGY STAR rated appliances and for even better savings consider products listed as “ENERGY STAR Most Efficient 2016.” You can search for products at the www.energystar.gov website.

Solar

Once you’ve completed all the possible energy efficient upgrades on your house, consider if adding a solar system might make sense. State and Federal tax credits make solar a very attractive option right now. Some important factors when evaluating a solar system:

- Roof was recently replaced or needs to be replaced.
- Good area of nearly south-facing roof.
- Able to be set back far enough from front of house (as described in the City of Dubuque’s Architectural Guidelines).

REDUCED UTILITY COST BREAKDOWN

The following table shows a 25% overall reduction in annual utility costs compared to the pre-retrofit table shown on page 9. :

ELECTRICITY USE	
Air conditioning	\$180
Lighting	\$80
Clothes washer	\$140
Refrigeration/freezer	\$120
Television/cable/DVR	\$120
Computers	\$80
Dishwasher	\$80
Other electronics, etc.	\$100
Annual Electricity Cost:	\$900
NATURAL GAS USE	
Furnace	\$450
Water heater	\$200
Stove, dryer, etc.	\$100
Annual Natural Gas Cost:	\$750
TOTAL ANNUAL UTILITY COST:	\$1,650



The experience of living in a historic home can be greatly enhanced when the homeowner makes energy efficiency improvements. Assessment of the home's historic character, its already existing energy efficient features and the home's existing energy use prior to completing any energy efficiency improvements will assure that the home's historic character is minimally impacted and that the homeowner's money is spent wisely.

The Energy Efficiency in Historic Homes: Guidelines For Increasing Comfort, Saving Money and Preserving Historic Character provides a framework for owners of historic homes when contemplating energy efficiency enhancements. These guidelines are not intended to be a thorough manual of practice for complete energy upgrades of historic buildings.

For more information, visit www.heritageworksdbq.com, or contact us at info@heritageworksdbq.com.



HERITAGE
WORKS



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Myths About Insulating Old House Walls

Submitted by **Bob Yapp** on Sun, 06/07/2009 - 2:48pm

I was recently chatting with a neighbor who asked, " We love our 100 year old home. However, it sure is a drafty old place! We're interested in blowing insulation into the walls, what do you think Bob?"

Let me start by saying, if you live in an old house you are part of a large group of plaster dust lovers. I have great respect for and kinship with people choosing to live on tree-lined streets full of unique old homes with character.

Having said that, it's time for an old house reality check. If your goal is to continue loving your old house, make it energy efficient while keeping your costs down, then you absolutely **don't** want to blow insulation into the sidewalls.

One of the top reasons for exterior paint failure, termites and structural damage to old houses is loose cellulose or fiberglass insulation blown into the sidewalls. "Hey, wait a minute Bob, if we can't insulate the sidewalls, how can we afford to heat our old house?" That's a valid question but you need to think of air movement in your house as if the house were a chimney. Heat loss primarily happens in an upward movement. So, I want you to insulate your attic space to an R-value that matches the region you live in. The U.S. Department of Energy has a map showing the zones, www.energystar.gov. After insulating your attic be sure you have good eave-to- roof-peak ventilation. You should also friction fit foam board insulation into the box sills in your basement (the area where the beams or floor joists rest on top of the foundation).

Most building codes today require that when a new house or addition is built in a northern climate, it must have a vapor barrier. When a new house is going up, they frame the sidewalls and install exterior sheathing. The next step is to go inside and install fiberglass, batting insulation between the 2" x 4" or 6" studs. Before the drywall can be installed over this wall, 4 mil thick plastic sheeting must be laid over the insulation on the entire wall. That plastic sheeting acts as the vapor barrier.

We create warm moist air in our homes by cooking, taking showers, having plants, breathing etc. That warm, moist vapor is attracted to the exterior walls. This vapor enters the wall through hairline wall cracks, outlets, switches and window trim. In new construction, the plastic vapor barrier under the drywall stops the wet air from getting to the insulation and condensating.

In old houses with plaster walls, there is no vapor barrier under the plaster so the wet air hits the insulation and condensates. This wets down the blown-in insulation making it a wet mass at the bottom of the wall cavity creating an inviting place for termites and dry rot. Then the moisture enters the exterior sheathing and wood siding causing permanent exterior paint failure. Since the homeowner, for some "unexplained" reason, can't keep paint on the house anymore, they call the vinyl siding salesman. This makes the problem even worse as you now have backer board (insulation board) and vinyl siding which in combination creates a vapor barrier on the outside of the wall that stops the free exchange of air, trapping more moisture.

The other big issue is "pillowing". Today we have dense pack cellulose insulation as well a foam. The installers cannot control the pressure of these products being jammed into your plastered wall cavity. They should only be used with open walls which means losing all your original plaster. Foam expands and the pressure used to install dense pack cellulose properly cannot be controlled within a closed wall. I am seeing catastrophic plaster failures in old and historic homes with these two products. The pressure from the installation process is great enough to loosen the nails holding the wood or wire lath to the stud wall. Once this happens the plaster bows inward, begins to crack and loses its bond to the lath.

The other factor that must be examined is payback. Lets say you spend \$4,000 to have your old house walls insulated. In my experience you would probably save about \$200 per year on heating and air

conditioning costs. So, it would take twenty years to recoup the money you spent on the insulation. Results and pricing can vary and this doesn't take into account the termites, dry rot or paint failure.

I've inspected thousands of old houses with blown-in insulation and over 80% of them have this wet insulation problem.

If your house is drafty then tighten it up. Weather-strip your windows and doors, keep the house painted/caulked well, insulate the attic and box sills. This will stop the air infiltration, make you more comfortable and **really** save money on utilities.

For those who have already blown insulation in their old homes, it can be removed. You'll need to remove several courses (rows) of siding and sheathing from the bottom of each side of the house as well as above the windows and doors. Just pull out the wet mess, let the wall dry out for a while and re-install the siding and sheathing.

You can also try to create a vapor barrier with special interior, vapor barrier grade paints. The effectiveness of the paints is severely limited and you'd still have to caulk all the window trim, outlets and switches. If you do this you'll also want to take the 1" diameter plastic plugs out of the siding. This is where they drill those attractive holes in the outside wall to blow-in the insulation. Replace them with screened and louvered 1" diameter vent plugs. After about a year the wall should be dried out and you can fill the holes or replace the siding or stucco in those areas. You can buy these vent plugs at lumberyards.

Again, the primary issue for energy efficiency is stopping excessive air infiltration. There is no reasonable payback to blowing insulation, foam or dense pack into the plastered sidewalls of your old or historic house. This practice has truly been the ruination of many of our historic central city homes.

For more information go to www.nps.gov and look for Preservation Briefs on energy efficiency. This is the site of the National Park Service.

MINUTES
 HISTORIC PRESERVATION COMMISSION
 EMMA J. HARVAT HALL
 November 12, 2020

PRELIMINARY

MEMBERS PRESENT: Kevin Boyd, Carl Brown, Sharon DeGraw, Helen Burford,
 Lyndi Kiple, Cecile Kuenzli, Quentin Pitzen, Jordan
 Sellergren, Austin Wu

MEMBERS ABSENT: None

STAFF PRESENT: Jessica Bristow, Anne Russett

OTHERS PRESENT: Kevin Monson

Electronic Meeting

(Pursuant to Iowa Code section 21.8)

An electronic meeting was held because a meeting in person was impossible or impractical due to concerns for the health and safety of Commission members, staff, and the public presented by COVID-19.

RECOMMENDATIONS TO COUNCIL: (become effective only after separate Council action)

CALL TO ORDER:

Chairperson Boyd called the meeting to order at 5:30pm.

PUBLIC DISCUSSION OF ANYTHING NOT ON THE AGENDA:

None

CERTIFICATE OF APPROPRIATENESS:

109 East College Street, 111-113 East College Street, 115 East College Street, 117-123 East College Street, and 125-127 East College Street – Local Historic Landmark

Bristow began her presentation about the properties on East College Street by discussing each building. 109 East College Street is the West Bay of the Dooley Block. Any of the wood elements on the front of 109 East College would be cleaned and repaired. For the rear demolition, a door will be removed as well as the top of the wall. This is all that will be done to this building except for the addition.

111-113 East College Street is the Sears, Roebuck & Co. building and it is missing some terracotta elements. These missing pieces will be replicated as closely as possible. Some of the masonry joints will be pointed and the front doors replaced as well. The entire back half of this building will be removed at a point that is roughly aligned with the back half of the other Dooley Block next door, with the new back wall having a row of punched openings and a small passage door.

115 East College Street is the East Bay of the Dooley Block. The wood elements on this building will be painted. On the back, there is a smaller, non-historic one-story addition that will

be removed, a second-floor door leading onto that roof that will be replaced (with the addition of a guardrail), and the stairs and gutter removed as well. The interior door that goes from the building to the addition will be removed and replaced with an exterior door.

117-123 East College Street is the Crescent Block, and it is one of the main renovations for adaptive reuse. A lot of the work will happen with the storefront - two second-floor windows will be removed and replaced, the entire "Union Bar" storefront will be replaced, and part of the "Soap Opera" storefront will be remodeled for accessibility. On the back, plant material along the back wall will be removed, individual windows on the third floor will be removed and replaced, a fire escape as well as two individual windows will be removed, and the entire farm store addition(s) will be removed so that the back wall will be in the original location. Since the building is a three-story building, it will also include an elevator addition in a portion of the existing "Revival" space. The new storefront (Union Bar) will be flat with recessed entry doors.

125-127 East College Street is the College Block Building, and it has had the facade cleaned several times as well as other work and repairs over the years. On the front, some of the elements will be cleaned and repainted. On the back, there is a one-story historic addition with a door, a fire escape, and stairs that will be removed, with the door being replaced.

Bristow explained the new addition drawings/plans for the work on the West half of the Dooley Block.

Bristow said that Preservation Brief 14, New Exterior Additions to Historic Buildings, talked about adding a larger addition in a denser area and creating a sense of scale, by dividing the facade up into smaller sections but is unable to happen with this project due to spatial constraints mentioned by the architects. She said that this project does not follow the guidelines generally, and said that the Commission discussed during the last meeting some of the concessions that they would be willing to make in order to have this project proceed and save the aforementioned buildings from any more invasive development. The project would need to be approved through the use of an exception. The site is on the outside edge of the boundary for the National Register Historic District and can provide parking access off of the alley, and allow the building to be set back visually from the facade. Bristow said Staff felt that this uncommon situation could be used as an exception to approve the elements of the project that do not generally follow the guidelines.

Boyd opened the public hearing. Hearing no discussion, Boyd closed the public hearing.

Kuenzli asked, if the Commission approves, if all of the buildings that do not currently have a local landmark designation will receive it. Bristow said that it would be a condition of the approval that they must be landmarked. She said that they are currently in process, that they have passed the first reading of council and won't get through the third reading until December 1st. Kuenzli said that she does not want to sign off on this until that landmark designation is a done deal. She asked about potential arguments to be made by outside parties for future project exceptions. Boyd said that the Commission exists to clarify the gray area when it arises.

Kuenzli asked who the targeted residents of the building will be. Wu said that, from the perspective of a student, it seems out of the price range for most college students, so he thought that the intended audience would be young professionals. Kuenzli asked if there will be some apartments designated for affordable housing for a percentage of the residents. Boyd said that he did not know specifically for this property. Russett said that the applicant is requesting

tax increment financing, which comes with the responsibility to address the issue of affordable housing. Monson said that Russett is correct, and that they are currently following the directions of the City Council.

MOTION: Burford moved to approve the Certificate of Appropriateness for the project at 109 East College Street, 111-113 East College Street, 115 East College Street, 117-123 East College Street, and 125-127 East College Street as presented in the application through the use of exception to the guidelines for the uncommon situation occurring with this project. The uncommon situation is described as the significance of these properties, both individually and as a group, their location on the outer edge of a proposed historic district, their ability to provide parking access from the alley and hidden from view, and their ability to provide setback addition. The project approval would include the following conditions: a local landmark overlay zoning for all included buildings will be complete prior to the issuance of the certificate of appropriateness, rear window and door condition is documented prior to replacement, the condition of the tile entry at Crescent Block is documented and the new tiles match the existing, and the storefront of the Crescent Block is revised with recessed entries. DeGraw seconded the motion. The motion carried on a vote of 9-0.

Monson said that the Commission has made a very important decision in saving a very critical part of Downtown and putting these storefronts into a landmark status so that they can never be removed or demolished. He thanked and applauded the Commission for their actions.

REPORT ON CERTIFICATES ISSUED BY CHAIR AND STAFF:

Certificate of No Material Effect - Chair and Staff Review

620 Oakland Avenue - Longfellow Historic District

This house was partially crushed by a tree - the damaged porch and rafters have already been fixed.

622 North Van Buren Street - Brown Historic District

Some railing was replaced that was damaged by the storm.

220 North Lucas Street - Goosetown/Horace Mann Conservation District

The foundation of the garage was damaged by a fallen tree. The owner is lifting the garage, putting a new foundation under it, and setting it back down.

426 Church Street - Goosetown/Horace Mann Conservation District

There are several projects at this location - this is just the approval of storm window product information for the Historic Preservation Fund.

935 East College Street - Local Historic Landmark

Work is being done on the porch (it has been worked on many times in the past). The River City Housing Collective had a report done on the status of this house that included historic information as well as details about the condition of the house and future work to be done. The contractor then put together a detailed proposal for work.

REPORT ON CERTIFICATES ISSUED BY CHAIR AND STAFF:

Minor Review - Staff Review

426 Church Street - Goosetown/Horace Mann Conservation District

The porch floor has some rot that will be replaced. The railing will also be replaced with something that is much more in line with the style of the house.

112 South Governor - College Hill Conservation District

This is a rental property with an attic apartment without egress windows, which caused issues with the housing inspectors. There was no place where the gable window could be replaced by a typical one, and there is not enough room, structurally, to put a dormer in. A contractor came up with the suggestion to install a skylight that is manufactured as an egress window.

1177 East Court Street - Longfellow Historic District

A solar array will be installed on the flat portion of the shed dormer.

320 East College Street, Trinity Episcopal Church - Local Historic Landmark

One of the wood framed windows in the courtyard area of the addition will be replaced with a product that looks similar but will be a metal storefront.

214 East Jefferson Street - Jefferson Street Historic District

A large format asphalt shingle was approved for the roof, but there has been difficulty in finding a source for enough of it. The color is meant to mimic the original slate tile roof.

533 South Summit Street - Summit Street Historic District

A second-floor window where most of the sash is broken will be replaced.

721 Grant Street - Longfellow Historic District

One of the basement windows will become an egress window.

1527 Muscatine Avenue - Dearborn Street Conservation District

A lot of the wood trim around the stucco was rotting and will be replaced. Some of the sashes will either be replaced or repaired.

CONSIDERATION OF MINUTES FOR OCTOBER 8, 2020:

Burford said that her comment on the top of the second to last page was not about saving the existing entrances, but rather about accommodating the needs of the theatre for large items. Bristow said that she is removing "saving the existing entrances" and changing it to "accommodating the needs of the theatre for large items".

MOTION: Kuenzli moved that the minutes be approved as amended. Pitzen seconded. Motion carries on a vote of 9-0.

COMMISSION DISCUSSION:

Bristow said that the Commission had correspondence from William Means, who owns the local landmark property at 120 Fairchild Street, who wrote an email with questions regarding 410-412 Clinton Street, in which he also asked to have the email addresses of the Commission members so that he could reach out to them. Bristow said that it would be fine for the Commission members to have individual conversations with Means when they review the project, as long as they note during the meeting that they had had prior discussion with him. Kuenzli asked if they would be discussing the letter.

Boyd and Bristow outlined the logistical steps and processes of the project. Bristow said that they will start the local landmark process next month for 410-412 Clinton Street. Kuenzli asked for explanation about the issues of setback mentioned in the letter. Bristow said that the setback, how far a residential property needs to be set back from the property line, is a distance that is potentially greater than what they are proposing with their new development and Means was concerned if that setback was allowed on the corner, then any of the other houses that are not landmarks that could be removed, developers might request that same reduced setback. Boyd said that the zoning that is used on this project is unlikely to be used for future preservations. Russett said that the applicant will be requesting a reduction in setbacks in exchange for the landmark designation.

Boyd said that he attended the PastForward National Preservation Conference and attended several sessions about historically underrepresented communities and how preservation fits through that lens. He said that, nationwide, they have made a lot of strides in preserving black history and they still have a long way to go. The National Trust has made a large effort to gather funds to help preserve sites related to black history. Boyd said that he thought the session on Hispanic communities was interesting and fit very neatly into the National Park Service's way of preserving things. He said the session on LGBTQ history had a lot of interest and push from the presenters to preserve LGBTQ sites and figure out ways to tell LGBTQ history. Boyd said that his takeaway was that they still have a lot to do in regards to LGBTQ preservation. Bristow said that she also attended sessions related to more modern construction and starting to preserve and protect these types of areas now. DeGraw said that she found the presentation about elevating whole buildings in Florida and the Florida Keys, in order to accommodate the presence of water, very interesting. She said that the video about putting ultra-modern additions on the backs of houses within a historic district is something that could come to Iowa City in the next 10-15 years. Burford said that there is a house in Morningside Heights that seems to have already done that.

COMMISSION INFORMATION:

None.

ADJOURNMENT: Boyd moved to adjourn the meeting. Seconded by DeGraw. The meeting was adjourned at 6:53pm.

Minutes submitted by Lauren Ralls.

HISTORIC PRESERVATION COMMISSION ATTENDANCE RECORD
2019-2020

NAME	TERM EXP.	11/14	12/12	1/09	2/13	3/12	4/09	5/14	6/11	7/09	8/13	9/10	10/08	11/12
AGRAN, THOMAS	6/30/20	X	X	X	O/E	X	X	X	X	--	--	--	--	--
BOYD, KEVIN	6/30/23	X	O/E	X	X	X	X	X	X	X	X	X	X	X
BROWN, CARL	6/30/23	--	--	--	--	--	--	--	--	X	O/E	X	X	X
BURFORD, HELEN	6/30/21	X	X	X	X	O/E	X	X	X	X	X	X	X	X
CLORE, GOSIA	6/30/20	X	O/E	X	X	X	X	X	X	--	--	--	--	--
DEGRAW, SHARON	6/30/22	X	O/E	X	X	O/E	X	X	X	X	X	X	O/E	X
KUENZLI, CECILE	6/30/22	X	X	X	X	O/E	X	X	X	X	O/E	X	X	X
KIPLE, LYNDI	6/30/22	X	X	O/E	O/E	X	X	X	X	X	X		X	X
PITZEN, QUENTIN	6/30/21	X	X	X	X	O/E	X	X	X	X	O/E	X	X	X
SELLERGREN, JORDAN	6/30/22	X	X	O/E	O/E	X	X	X	X	X	X	X	X	X
WU, AUSTIN	6/30/23	--	--	O/E	X	X	O/E	X	X	X	X	X	X	X