# BHPC MEETING PACKET 



## Thursday March 10, 2022

5:00 p.m.
Prepared by HAND Staff
In Person
The McCloskey Room, 401 N Morton ST STE 135 Bloomington IN 47404
$\&$
Zoom
https://bloomington.zoom.us/j/95852185508?pwd=M3J2aDgrdjdXaWh1QUN3eWRKYThKQT09
Meeting ID: 95852185508
Passcode: 082945

One tap mobile
+13126266799,,95852185508\# US (Chicago)
+19292056099,,95852185508\# US (New York)

Dial by your location
+1 3126266799 US (Chicago)
+1 9292056099 US (New York)
+1 3017158592 US (Washington DC)

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# Bloomington Historic Preservation Commission Meeting Hybrid Meeting <br> In person: The McCloskey Room, 401 N Morton ST STE 135 Bloomington IN 47404 <br> Zoom: https://bloomington.zoom.us/j/95852185508?pwd=M3J2aDgrdjdXaWh1QUN3eWRKYThKQT09 <br> Meeting ID: 95852185508 Passcode: 082945 <br> Thursday March 10, 2022, 5:00 P.M. <br> AGENDA 

## I. CALL TO ORDER

II. ROLL CALL

## III. APPROVAL OF MINUTES

A. FEBRUARY 24, 2022

## IV. CERTIFICATES OF APPROPRIATENESS <br> Staff Approval

A. COA 22-21

621 W 7th St. (NWS Conservation District)
Petitioner: Ian and Kathleen Bensberg
Fence Construction

## Commission Review

B. COA 22-16

701 S Ballantine Rd. (Elm Heights Historic District)
Petitioner: Jonathan Fiedler
Partial Demolition - Remove chimney

C. COA 22-17<br>520 S Hawthorne St. (Elm Heights Historic District)<br>Petitioner: Wes Biddle<br>Solar Panel installation

D. COA 22-18

1000 E Atwater Ave. (Elm Heights Historic District)
Petitioner: John Biermann
Full Window Change
E. COA 22-19

208 E 16th St. (Garden Hill Historic District)
Petitioner: Lisa Freeman
Addition
F. COA 22-20

916 S Morton St. (McDoel Historic District)
Petitioner: Barre Klapper, Springpoint Architects
Addition

## V. NEW BUSINESS

## VI. OLD BUSINESS

Johnson Creamery Nomination
Public comment opportunity

10th Street/ Bypass Construction - Hinkle Garton Farmstead
VII. COMMISSIONER COMMENTS

## VIII. PUBLIC COMMENTS ANNOUNCEMENTS

The demolition delay DD 22-09 for the proposed full demolition of 200 E Kirkwood Ave. (Contributing) will be revisited during the HPC Meeting scheduled for March 24, 2022.
IX. ADJOURNMENT

Auxiliary aids for people with disabilities are available upon request with adequate notice. Please call 812-349-3429 or email, human.rights@bloomington.in.gov.
Next meeting date is March 24, 2022 at 5:00 P.M. and will be a teleconference via Zoom, in person or hybrid. Posted: 3/3/2022

Bloomington Historic Preservation Commission Meeting
Zoom: https://bloomington.zoom.us/j/95852185508?pwd=M3J2aDgrdjdXaWh1QUN3eWRKYThKQT09
Meeting ID: 95852185508 Passcode: 082945
Thursday February 24, 2022, 5:00 P.M.
AGENDA

## I. CALL TO ORDER

Meeting was called to order by Chair John Saunders @ 5:00 p.m.
II. ROLL CALL

## Commissioners Present:

Sam DeSollar<br>Marleen Newman<br>Elizabeth Mitchell<br>Reynard Cross<br>Matthew Seddon<br>John Saunders<br>Allison Chopra

## Advisory Members Present:

Duncan Campbell

## Staff Present:

Gloria Colom, HAND
John Zody, HAND
Brent Pierce, HAND
Dee Wills, HAND
Patrick Dierkes, City Engineering Department
Jacqueline Scanlan, City Development Services Manager
Daniel Dixon, City of Bloomington Legal Department

## Guests Present:

Justin Fox
Tim Cover
Melissa Brown
Jim Suttner

Suzanne
Jacob Bower-Bir
Peter Dorfman
Karen Duffy
Richard Lewis
William Bianco
Elliot Lewis
Zach Bode

## III. APPROVAL OF MINUTES

A. JANUARY 27, 2022

Elizabeth Mitchell made a motion to approve January 27, 2022 Minutes.
Marleen Newman seconded.
Motion Carries: 7 Yes (Schlegel, Chopra, Saunders, DeSollar, Cross, Seddon, Mitchell), 0 No, 0 Abstain

## IV. CERTIFICATES OF APPROPRIATENESS

## Staff Review

A. COA 22-13

414 W Dodds St. (McDoel Historic District)
Petitioner: Robert Shaw
Window replacement, non-contributing structure.

Gloria Colom gave presentation. See packet for details.

## Commission Review

B. COA 22-14

820 W Kirkwood Ave. (Near West Side Conservation District)
Petitioner: Justin Fox
Addition to house - multi-family units.

Gloria Colom gave presentation. See packet for details.

Peter Dorfman the President of the Near West Side Neighborhood Association stated that there was nothing in the Petition for them to object to from the Historic Preservation standpoint. Peter Dorfman commented that Justin Fox had contacted him just after he acquired this property with
the intention of contacting the neighborhood so as to be concerned and accommodating to the neighborhoods concerns. He has been in contact multiple times since then, and kept us up to date on how this project was evolving. Peter Dorfman stated that he wanted to say to any applicant who might be listening, that this is the way this should be done. The contact that we have had from this Applicant has been exemplary. This kind of regular contact and practice of keeping us apprised of what is really being proposed, this is the way these applications really should go and want to commend the Applicant in this case.

Marleen Newman asked the Petitioner if there were six units in the project. Justin Fox replied yes there were six studios. Sam DeSollar asked if there was a roof plan, or a landscaping plan. Elizabeth Mitchell asked the Petitioner if he knew the history of this house.

Marleen Newman commented that she liked the design, and that the elevations and the massing were nicely done. Sam DeSollar commented on the south roof elevations. See packet for details.

Allison Chopra made a motion to approve COA 22-14.<br>Sam DeSollar seconded.<br>Motion Carries: 8 Yes (Schlegel, Chopra, Saunders, DeSollar, Cross, Seddon, Mitchell, Newman), 0 No, 0 Abstain

## C. COA 22-03

2001 E Hillside Dr., Lot 8 (The Reverend James Faris House Historic District)
Petitioner: Jacob Bower-Bir
Partial Demolition and new construction.

Gloria Colom gave presentation. See packet for details.

Marleen Newman asked what the dimensions were of the bedroom, living room, bathroom and kitchen of the garage space. Discussion ensued. See packet for details. Sam DeSollar asked about the distance from the porch to the existing windows and how far the south wall of the porch is to the exterior window on the original plan.

Marleen Newman commented that she still had a problem with the two face facades being at the same level and that there could have been some accommodation taken up in the bedroom, living room, and bathroom to take out a couple of feet and also the shape of the laundry room is odd. More discussion ensued. See packet for details. Sam DeSollar commented that he thought this project had come a long way, but discussed other issues with the downspouts and gutters.

Matt Seddon commented that he thought the Architect and the Petitioner were working very hard, have been taking the comments, is a good actor and is concerned about doing a good job. Matt Seddon commented that he did not think these issues would result in a disaster for the Historical Character of this house. Allison Chopra commented that she thought this was a beautiful historic home and have no doubt it will remain as beautiful as it is now based on the renderings.

Matt Seddon made a motion to approve COA 22-03.
Allison Chopra seconded.
Motion Carries: 7 Yes ( Schlegel, Chopra, Saunders, DeSollar, Cross, Seddon, Mitchell), 0 No, 1 Abstain (Newman)
D. COA 22-15

600 W Howe St. (Greater Prospect Hill Historic District)
Petitioner: Julia A. Kerr
Partial Demolition and new construction.

Gloria Colom gave presentation. See packet for details.

Marleen Newman commented that she thought this was nicely done. Sam DeSollar commented that he would strongly urge the Petitioner to use a metal roof for the back porch. Elizabeth Mitchell commented that it looked good to her.

Matthew Seddon made a motion to approve COA 22-15.
Elizabeth Mitchell seconded.
Motion Carries: 8 Yes (Schlegel, Chopra, Saunders, DeSollar, Cross, Seddon, Mitchell, Newman), 0 No, 0 Abstain.

## V. DEMOLITION DELAY

A. DD 22-08

416 W 1st St. (653 S Rogers St.) (Contributing)
Petitioner: Melissa Brown
Full demolition.

Gloria Colom gave presentation. See packet for details.

Sam DeSollar commented that this falls into the category of all the other houses around the hospital and would strongly encourage them to have BRI take a look at it to either move it or salvage pieces of it. Elizabeth Mitchell commented that she did not understand tearing down a perfectly good house, and why there is no attempt to move or save it.

Matt Seddon made a motion to release Demolition Delay 22-08. Sam DeSollar seconded.
Motion Carries: 5 Yes (Chopra, Saunders, DeSollar, Cross, Seddon), 0 No, 3 Abstain (Schlegel, Mitchell, Newman)
B. DD 22-09

200 E Kirkwood Ave. (Contributing)
Petitioner: Thomas Ritman
Full demolition.

Gloria Colom gave presentation. See packet for details.

Marleen Newman agreed that it was a primarily intact modernist building and had some interesting elements of the modernist style or internationalist style and that they are being sort of decimated. Marleen Newman commented that she personally thinks they should look at this for designation. Daniel Schlegel agreed that since this house is contributing it should be considered for designation. Sam DeSollar asked Gloria Colom if she thought that more could be found information on this building, and would also like to find out who the architect was. Matt Seddon commented that Gloria Colom made a very good argument based on city code that we should nominate this and send it to the City Council. Elizabeth Mitchell commented that she thought it was worth saving. Allison Chopra commented that is appeared that there were some changes to the original design to the windows and to the black material used for the front façade. Gloria Colom stated that it was in fact original. Duncan Campbell stated that he thought it should be designated.

Tim Cover with Video Three Design gave presentation. See packet for details. Jim Suttner with Blue \& Company, LLC gave presentation. See packet for details. Elliot Lewis with ER Lewis \& Company, LLC gave presentation. See packet for details.

Marleen Newman asked why there could not be an addition to the building. Sam DeSollar commented that the duty of the HPC does not come from how buildings are financed. We are looking at the building to see if it is historic and to see if it merits enough for designation, and thinks that they need to look in to this more. Matthew Seddon commented that he would reiterate everything that Sam DeSollar said. Elizabeth Mitchell and Reynard Cross also agreed with Sam DeSollar and Matthew Seddon. John Saunders agreed with the other Commissioners. Daniel Dixon commented that they were within the ninety day window and that there were more questions about the qualified opportunity zone and that he did not think they were at a point to make a decision on this yet.

Sam DeSollar made a motion to postpone Demolition Delay 22-09 to the March 24, 2022 meeting.
Matt Seddon seconded.
Motion Carries: 8 Yes (Schlegel, Chopra, Saunders, DeSollar, Cross,Seddon, Mitchell, Newman), 0 No, 0 Abstain.

## VI. NEW BUSINESS

A. HPC Subcommittee - Maple Heights Historic District Guidelines

Gloria Colom stated that there were two districts that need to update their guidelines. One is Maple Heights Historic District and Garden Hill Historic District.
B. Johnson's Creamery - nomination as local Historic District

Gloria Colom and Daniel Dixon gave presentation. See packet for details.

Discussion ensued. See packet for details.

John Saunders made a motion to begin the formal process of designation for the Johnson's Creamery.
Allison Chopra so moved.
Matthew Seddon seconded.
Motion Carries: 8 Yes (Schlegel, Chopra, Saunders, DeSollar, Cross, Seddon, Mitchell, Newman), 0 No, 0 Abstain.
C. Neighborhood Input Guidelines

## VII. OLD BUSINESS

VIII. COMMISSIONER COMMENTS
IX. PUBLIC COMMENTS ANNOUNCEMENTS

## X. ADJOURNMENT

Meeting was adjourned by John Saunders @ 6:47 p.m.

## END OF MINUTES

Video record of meeting available upon request.

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| :---: | :---: |
| COA 22-2 | Petitioner: lan and Kathleen Bensberg |
|  | Parcel: 53-05-32-4I4-016.000-005 |
| RA |  |
| Background: NearWest Side conservation District <br> Request: Four foot picket fence construction in front and six foot vertical wood board construction in backyard. <br> Guidelines: Near West Side conservation District Guidelines <br> Staff Approved COA 22-2I: <br> - The proposed fencing complied with the recommendations within the local conservation district guidelines in heigh, location, materials, and form. <br> - Construction Subcommittee: " The Near West Side Design Review Committee has discussed the 621 W. 7th St. fence proposal and found nothing to object to." (Email from Peter Dorfman March 7, 2022) |  |
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APPLICATION FORM<br>CERTIFICATE OF APPROPRIATENESS

Case Number: $\quad$ COA 22-21
Date Filed: $\quad 2 / 28 / 2022$
Scheduled for Hearing: $\quad 3 / 24 / 2022$

Address of Historic Property:
621 W. 7th St. Bloomington IN 47404
Petitioner's Name: lan Bensberg and Kathleen bensberg

Petitioner's Address: 621 W. 7th St. Bloomington IN 47404 (610)505-2882/katie.bensberg@gmail.com

Phone Number/e-mail: Ian Bensberg and Kathleen Bensberg Owner's Address: 621 W. 7th St. Bloomington IN 47404 (765)366-8826/ian.bensberg@gmail.com

Instructions to Petitioners

The petitioner must attend a preliminary meeting with staff of the Department of Housing and Neighborhood Development during which the petitioner will be advised as to the appropriateness of the request and the process of obtaining a Certificate of Appropriateness. The petitioner must file a "complete application" with Housing and Neighborhood Department Staff at least twelve (12) days before a scheduled regular meeting. The Historic Preservation Commission meets the second Thursday of each month at 5:00 P.M. in the McCloskey Room (meetings are currently held via Zoom until further notice. The link is sent the week before the meeting). The petitioner or his designee must attend the scheduled meeting in order to answer any questions or supply supporting material. You will be notified of the Commission's decision and a Certificate of Appropriateness will be issued to you. Copies of the Certificate must accompany any building permit application subsequently filed for the work described. If you feel uncertain of the merits of your petition, you also have the right to attend a preliminary hearing, which will allow you to discuss the proposal with the Commission before the hearing during which action is taken. Action on a filing must occur within thirty days of the filing date, unless a preliminary hearing is requested.

Please respond to the following questions and attach additional pages for photographs, drawings, surveys as requested.

A "Complete Application" consists of the following:

1. A legal description of the lot. Pt. Out Lot 13 recorded at page 28 of Deed Record A
2. A description of the nature of the proposed modifications or new construction: $4 \mathrm{ft} \mathrm{tall} \mathrm{front} \mathrm{yard} \mathrm{picket} \mathrm{fence} \mathrm{in} \mathrm{wood} \mathrm{(cedar)}$.6 foot tall privacy fence around back yard in wood (pine).
All fencing will have vertical boards.
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3. A description of the materials used. wood, cedar for front yard fence and pine for back yard fence.
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4. Attach a drawing or provide a picture of the proposed modifications. You may use manufacturer's brochures if appropriate.
5. Include a scaled drawing, survey or geographic information system map showing the footprint of the existing structure and adjacent thoroughfares, Geographic Information System maps may be provided by staff if requested. Show this document to Planning Department Staff in order to ascertain whether variances or zoning actions are required.
6. Affix at least three photographs showing the existing full facade at each street frontage and the area of modification. If this petition is a proposal for construction of an entirely new structure or accessory building, include photographs of adjacent properties taken from the street exposure.

If this application is part of a further submittal to the Board of Zoning Appeals for a Conditional Use or development standard variance, please describe the use proposed and modification to the property which will result.




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Background: Elm Heights Historic District

## Request: Partial Demolition, removal of chimney

## Guidelines: Elm Heights Historic District Guidelines

- pg. 24 "To retain and restore original roofs and special features, such as unique materials, cresting, box gutters, dormers, cornices, cupolas, and chimneys where they are significant to the design of the building, through routine maintenance and repairs."
- A change in the appearance, either shape or materials, of a roof or roof feature, including guttering. Replace only the deteriorated portion of a historic roof and use substitute materials only if using the original material is not technically feasible. If full replacement is necessary, replace it "in kind," matching the original in materials, scale, detail, pattern, and design.
- pg. 37 Demolition of all primary, secondary, and accessory structures, including contributing walls and fences.
- The structure poses an immediate and substantial threat to public safety as interpreted from the state of deterioration, disrepair, or structural instability.
- Upon further consideration by the Commission, the historic or architectural significance of the structure is such that it does not contribute to the historic character of the district.
- The demolition is necessary to allow development that, in the Commission's opinion, is of greater significance to the preservation of the district than is retention of the structure, or portion thereof, for which demolition is sought.
- The structure is accidentally damaged by storm, tornado, fire, flood, or other natural disaster. In this case, it may be rebuilt to its former configuration and materials without regard to these guidelines if work is commenced within 6 months.
- The structure or property cannot be put to any reasonable economically beneficial use without the approval of the demolition.


## Staff Recommendation: request for more information

- Demolition in the Elm Heights Historic District is highly discouraged unless the structure presents a public threat or has been damaged due to a natural disaster.
- Staff needs additional information as to why the chimney is being condemned and if there are options to keep the chimney itself while allowing for interior remodeling.


# APPLICATION FORM <br> CERTIFICATE OF APPROPRIATENESS 

| Case Number: | COA 22-16 |
| :--- | :--- |
| Date Filed: | $2 / 15 / 2022$ |
| Scheduled for Hearing: | $3 / 10 / 2022$ |

## 701 S Ballantine Petitioner's Name: Jonathan Fiedler <br> Petitioner's Address: 701 S Ballantine <br> Phone Number/e-mail: 812-606-1226, jon.fiedler@gmail.com <br> owner's Name: Jonathan Fiedler \& Jennifer Schopf <br> owner's Address: 701 S Ballantine <br> Phone Number/e-mail: 812-606-1226, jon.fiedler@gmail.com

## Instructions to Petitioners

The petitioner must attend a preliminary meeting with staff of the Department of Housing and Neighborhood Development during which the petitioner will be advised as to the appropriateness of the request and the process of obtaining a Certificate of Appropriateness. The petitioner must file a "complete application" with Housing and Neighborhood Department Staff at least twelve (12) days before a scheduled regular meeting. The Historic Preservation Commission meets the second Thursday of each month at 5:00 P.M. in the McCloskey Room (meetings are currently held via Zoom until further notice. The link is sent the week before the meeting). The petitioner or his designee must attend the scheduled meeting in order to answer any questions or supply supporting material. You will be notified of the Commission's decision and a Certificate of Appropriateness will be issued to you. Copies of the Certificate must accompany any building permit application subsequently filed for the work described. If you feel uncertain of the merits of your petition, you also have the right to attend a preliminary hearing, which will allow you to discuss the proposal with the Commission before the hearing during which action is taken. Action on a filing must occur within thirty days of the filing date, unless a preliminary hearing is requested.

## Please respond to the following questions and attach additional pages for photographs, drawings, surveys as requested.

A "Complete Application" consists of the following:

1. A legal description of the lot. $\qquad$
2. A description of the nature of the proposed modifications or new construction:

The current chimney stack has been condemned, so we'd like to remove the stack entirely as the placement of the fireplaces splits the living room in two. Removing the chimney stack would allow us to have a much better layout on the first floor. With the trees in the front of the property, the chimney is not very visible from any of the street frontages, so the impact to the character of the house is minimal.
3. A description of the materials used.

N/A - removal of chimney stack (which is currently brick).
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4. Attach a drawing or provide a picture of the proposed modifications. You may use manufacturer's brochures if appropriate.
5. Include a scaled drawing, survey or geographic information system map showing the footprint of the existing structure and adjacent thoroughfares, Geographic Information System maps may be provided by staff if requested. Show this document to Planning Department Staff in order to ascertain whether variances or zoning actions are required.
6. Affix at least three photographs showing the existing full facade at each street frontage and the area of modification. If this petition is a proposal for construction of an entirely new structure or accessory building, include photographs of adjacent properties taken from the street exposure.

If this application is part of a further submittal to the Board of Zoning Appeals for a Conditional Use or development standard variance, please describe the use proposed and modification to the property which will result.








Background: Elm Heights Historic District
Request: Solar Panel installation
Guidelines: Elm Heights Historic District Guidelines

- Installation of solar attic fans, solar collectors, solar hot water systems, and other similar energy-generating technology.
- Install systems to avoid obscuring significant building or site features or adversely affecting the perception of the overall character of the property.
- Installations visible from the street can be considered when placement elsewhere is not feasible. Consider installing retrofits on an addition, on a secondary structure (e.g., a garage or garden shed), in a side or rear yard, or on yard features (e.g., a pergola or arbor).
- Minimize damage to or removal of significant features. Use the least invasive practical method to attach systems to a historic roof.
- When mounting energy generation systems, consider threats to the structural integrity of the building, including load bearing capacities, such as excessive weights, water infiltration, and forces generated by windstorms.
- To minimize visibility, mount collectors below the ridgeline of a sloping roof and parallel to the roof slope. Reflective exposed hardware, frames, and piping should be consistent with the color scheme of the roof and/or primary structure; matte finishes of black, brown, or gray are suggested.


## Staff Recommendation: approval of the solar panel installation

Upon reviewing the application material, staff understands that solar panel installation is highly dependent and limited to sun movement, even if that means they will be visible from the main rights of way, in this case Hawthorne Drive and 2nd Street.

# APPLICATION FORM <br> CERTIFICATE OF APPROPRIATENESS 

Case Number:
COA 22-17

Date Filed:
Scheduled for Hearing: 3/10/2022

# Address of Historic Property: 520 Hawthorne st <br> Petitioner's Name: <br> <br> wes biddle <br> <br> wes biddle <br> Petitioner's Address: <br> 1401 s madison st <br> Phone Numberle-mail: 812-325-5164 <br> Owner's Name:Apple gate, John , Amy <br> owner's Address: 520 hawthrone dr <br> Phone Number/-mail: j : apple@indiana.edu 

## Instructions to Petitioners

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## Please respond to the following questions and attach additional pages for photographs, drawings, surveys as requested.

A "Complete Application" consists of the following:

1. A legal description of the lot. $015-40070-00$ Elm Heights Pt L60 \& Pt L61 \& Pt Lot 60
2. A description of the nature of the proposed modifications or new construction: Installation of black frame solar panels on roof. Panels would conture roof line, using all black railing inverter to be located in basement . panels would attacheds to structure using flashings, and then when the roof needs to be replaed and the solar panels are removed there would be no lasting impact to structure .
$\qquad$
$\qquad$
3. A description of the materials used. LG 435 black frame solar panels roof mounted, uni rac aluminum rail ( black ),
$\qquad$
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$\qquad$
$\qquad$
$\qquad$
$\qquad$
4. Attach a drawing or provide a picture of the proposed modifications. You may use manufacturer's brochures if appropriate.
5. Include a scaled drawing, survey or geographic information system map showing the footprint of the existing structure and adjacent thoroughfares, Geographic Information System maps may be provided by staff if requested. Show this document to Planning Department Staff in order to ascertain whether variances or zoning actions are required.
6. Affix at least three photographs showing the existing full facade at each street frontage and the area of modification. If this petition is a proposal for construction of an entirely new structure or accessory building, include photographs of adjacent properties taken from the street exposure.

If this application is part of a further submittal to the Board of Zoning Appeals for a Conditional Use or development standard variance, please describe the use proposed and modification to the property which will result.


# LG $N e=N^{*} R$ 

## LG435QAC-A6

## 435W

LG NeON ${ }^{\circledR}$ R is powerful solar module that provides world-class performance. A new cell structure that eliminates electrodes on the front maximizes the utilization of light and enhances reliability.

LG NeON ${ }^{\circledR}$ R is a result of LG's efforts to increase customer's values beyond efficiency. LG NeON ${ }^{\circledR}$ R features enhanced durability, performance under real-world conditions, an enhanced warranty and aesthetic design suitable for roofs.


Features

Roof Aesthetics
LG NeON® R has been designed with aesthetics in mind: the lack of any electrodes on the front creates an improved, modern aesthetic.

## 25-Year Limited Product Warranty

The NeON ${ }^{\circledR}$ R is covered by a 25 -year limited product warranty. In addition, up to $\$ 450$ of labor costs will be covered in the rare case that a module needs to be repaired or replaced.

Enhanced Performance Warranty
The $\mathrm{LG} \mathrm{NeON}{ }^{\circledR} \mathrm{R}$ has an enhanced performance warranty. After 25 years, LG NeON ${ }^{\circledR} \mathrm{R}$ is guaranteed at least $92.5 \%$ of initial performance.


## More generation per square meter

The LG NeON ${ }^{\circledR} \mathrm{R}$ has been designed to significantly enhance its output, making it efficient even in limited space.

When you go solar, ask for the brand you can trust: LG Solar

## LG $\mathrm{NeON}^{\bullet}$ R

## LG435QAC-A6

General Data

| Cell Properties (Material/Type) | Monocrystalline / N-type |
| :--- | :---: |
| Cell Maker | LG |
| Cell Configuration | 66 Cells $(6 \times 11)$ |
| Module Dimensions (L $\times$ W $\times \mathrm{H}$ ) | 20.5 kg |
| Weight | Tempered Glass with AR Coating |
| Glass (Material) | White |
| Backsheet (Color) | Anodized Aluminium |
| Frame (Material) | IP 68 with 3 Bypass Diodes |
| Junction Box (Protection Degree) | $1,250 \mathrm{~mm} \times 2 \mathrm{~mA}$ |
| Cables (Length) | MC 4 / MC |
| Connector (Type/Maker) |  |

## Certifications and Warranty

| Certifications | IEC 61215-1/-1-1/2 : 2016, IEC 61730-1/2:2016, <br> UL 61730-1 : 2017, UL 61730-2:2017 |
| :--- | :---: |
|  | ISO 9001, ISO 14001, ISO 50001 |
|  | OHSAS 18001 |
| Salt Mist Corrosion Test | IEC 61701:2011 Severity 6 |
| Ammonia Corrosion Test | IEC 62716 : 2013 |
| Hail Test | 25mm (1") diameter at 23m/s (52mph) |
| Module Fire Performance | Type 1 (UL 61730) |
| Fire Rating | Class C (UL 790, ULC / ORD C 1703) |
| Solar Module Product Warranty | 25 Years |
| Solar Module Output Warranty | Linear Warranty* |
| * |  |

*Improved: $1^{\text {st }}$ year 98.5\%, from 2-24th year: -0.25\%/year down, $92.5 \%$ at year 25

## Temperature Characteristics

| NMOT $^{*}$ | $\left[{ }^{\circ} \mathrm{C}\right]$ | $44 \pm 3$ |
| :--- | :---: | :---: |
| Pmax | $\left[\% /{ }^{\circ} \mathrm{C}\right]$ | -0.29 |
| Voc | $\left[\% /{ }^{\circ} \mathrm{C}\right]$ | -0.24 |
| Isc | $\left[\% /{ }^{\circ} \mathrm{C}\right]$ | 0.04 |

*NMOT (Nominal Module Operating Temperature): Irradiance $800 \mathrm{~W} / \mathrm{m}^{2}$, Ambient temperature $20^{\circ} \mathrm{C}$, Wind speed $1 \mathrm{~m} / \mathrm{s}$, Spectrum AM 1.5

\left.| Electrical Properties (NMOT) |  |  |  |
| :--- | :---: | :---: | :---: |
| Model |  |  | LG435QAC-A6 |
| Maximum Power (Pmax) |  |  |  |
| MPP Voltage (Vmpp) |  |  |  |
| MPP Current (Impp) |  |  |  |
| [V] |  |  |  |$\right] 330$

## I-V Curves



Electrical Properties (STC*)

| Model |  | LG435QAC-A6 |
| :--- | :---: | :---: |
| Maximum Power (Pmax) | $[\mathrm{W}]$ | 435 |
| MPP Voltage (Vmpp) | $[\mathrm{V}]$ | 41.1 |
| MPP Current (Impp) | $[\mathrm{A}]$ | 10.59 |
| Open Circuit Voltage (Voc, $\pm 5 \%)$ | $[\mathrm{V}]$ | 48.0 |
| Short Circuit Current (Isc, $\pm 5 \%)$ | $[\mathrm{F}]$ | 11.20 |
| Module Efficiency | $[\%]$ | 21.9 |
| Power Tolerance | $[\%]$ | $0 \sim+3$ |

*STC (Standard Test Condition): Irradiance $1000 \mathrm{~W} / \mathrm{m}^{2}$, Cell temperature $25^{\circ} \mathrm{C}, \mathrm{AM} 1.5$
Measure Tolerance: $\pm 3 \%$

Operating Conditions

| Operating Temperature* | $\left[{ }^{\circ} \mathrm{C}\right]$ | $-40 \sim+85$ |
| :--- | :---: | :---: |
| Maximum System Voltage | $[\mathrm{V}]$ | 1,000 |
| Maximum Series Fuse Rating | $[\mathrm{A}]$ | 20 |
| Mechanical Test Load** (Front) | $[\mathrm{Pa} / \mathrm{psf}]$ | 5,400 |
| Mechanical Test Load** (Rear) | $[\mathrm{Pa} / \mathrm{psf}]$ | 4,000 |

${ }^{*}$ The operating ambient temperature of these devices may exceed $40^{\circ} \mathrm{C}$ at full load for all wire sizes if is determined
suitable in the field use application.
**Based on IEC 61215-2 : 2016 (Test Load = Design Load x Safety Factor (1.5))

| Number of Modules per Pallet | [EA] | 25 |
| :---: | :---: | :---: |
| Number of Modules per 40' Container | [EA] | 600 |
| Number of Modules per 53' Container | [EA] | 800 |
| Packaging Box Dimensions ( $\mathrm{L} \times \mathrm{W} \times \mathrm{H}$ ) | [mm] | $1,960 \times 1,120 \times 1,221$ |
| Packaging Box Dimensions ( $\mathrm{L} \times \mathrm{W} \times \mathrm{H}$ ) | [in] | $77.2 \times 44.1 \times 48.1$ |
| Packaging Box Gross Weight | [kg] | 549 |
| Packaging Box Gross Weight | [lb] | 1,210 |

Dimensions (mm/inch)


Life's Good

LG Electronics USA, Inc Solar Business Division 2000 Millbrook Drive Lincolnshire, IL 60069
www.lg-solar.com




STAFF
RECOMMENDATIONS
3. introduction of inappropriate styles or materials such as vinyl or aluminum or steel replacement doors
4. addition of cosmetic detailing that creates a style or appearance that the original building never exhibited.

- Install shutters only when they are appropriate to the building style and are supported by evidence of previous existence. Proportion the shutters so they give the appearance of being able to cover the window openings, even though they may be fixed in place.
- Install awnings of canvas or another compatible material. Fiberglass or plastic should generally be avoided; however, metal may be appropriate on some later-era homes.
III. Installation of new storm windows or doors visible from the public right-of-way.
- Wood-frame storm windows and doors are the most historically preferred option.
- However, metal blind-stop storm windows or full-light storm doors are acceptable.All should be finished to match the trim or be as complementary in color to the building as possible.


## Staff Recommendation: Staff does not recommend installing new windows but rather repairing existing windows and replacing the storm windows that were removed.

From the photographs, the existing historic windows appear to require maintenance, particularly removing paint from the glass and doing some repairs.

Staff had been notified that existing storm windows had been removed. The principle recommendation for maintaining historic windows in the Elm Heights Historic District is to maintain, repair, and protect existing windows using storm windows.

# APPLICATION FORM CERTIFICATE OF APPROPRIATENESS 

Case Number: 22-18

Date Filed: 2/23/2022

Scheduled for Hearing: 3/10/2022

## Address of Historic Property:

1000 Atwater Ave, Bloomington IN 47401
Petitioner's Name: John Biermann
Petitioner's Address: 616 S College Mall Rd, Bloomington IN 47401
Phone Number/e-mail: 812-345-9171
Owner's Name: ${ }^{\text {BMI Properties LLC }}$
Owner's Address: Po Box 5543 Bloomington, In 47407
Phone Number/e-mail: 844-254-7368 / Maintenance@thebrawleygroup.com

## Instructions to Petitioners

The petitioner must attend a preliminary meeting with staff of the Department of Housing and Neighborhood Development during which the petitioner will be advised as to the appropriateness of the request and the process of obtaining a Certificate of Appropriateness. The petitioner must file a "complete application" with Housing and Neighborhood Department Staff at least twelve (12) days before a scheduled regular meeting. The Historic Preservation Commission meets the second Thursday of each month at 5:00 P.M. in the McCloskey Room (meetings are currently held via Zoom until further notice. The link is sent the week before the meeting). The petitioner or his designee must attend the scheduled meeting in order to answer any questions or supply supporting material. You will be notified of the Commission's decision and a Certificate of Appropriateness will be issued to you. Copies of the Certificate must accompany any building permit application subsequently filed for the work described. If you feel uncertain of the merits of your petition, you also have the right to attend a preliminary hearing, which will allow you to discuss the proposal with the Commission before the hearing during which action is taken. Action on a filing must occur within thirty days of the filing date, unless a preliminary hearing is requested.

## Please respond to the following questions and attach additional pages for photographs, drawings, surveys as requested.

A "Complete Application" consists of the following:

1. A legal description of the lot. $015-57720$-00 Elm Heights Lot 24
2. A description of the nature of the proposed modifications or new construction: Replace all of the windows around the entire structure
$\qquad$
$\qquad$
$\qquad$
$\qquad$
3. A description of the materials used.

Moderate 400 Series Woodwright Double-hung-WWI, equal Sash, White Exterior Frame, White exterior sash/panel, Pine w/white painted Interior Sash/Panel, AA, Dual Pane Low-E4 Standard Argon Fill Finelight Grilles-between-the-Glass 4 wide 2 high, specified Equal Light Patter, White, w/white, 3/4" Grille Bar, 1 Sash locks White, white/white Jamb Liner, White,

Full Screen, Aluminum
4. Attach a drawing or provide a picture of the proposed modifications. You may use manufacturer's brochures if appropriate.
5. Include a scaled drawing, survey or geographic information system map showing the footprint of the existing structure and adjacent thoroughfares, Geographic Information System maps may be provided by staff if requested. Show this document to Planning Department Staff in order to ascertain whether variances or zoning actions are required.
6. Affix at least three photographs showing the existing full facade at each street frontage and the area of modification. If this petition is a proposal for construction of an entirely new structure or accessory building, include photographs of adjacent properties taken from the street exposure.

If this application is part of a further submittal to the Board of Zoning Appeals for a Conditional Use or development standard variance, please describe the use proposed and modification to the property which will result.



North Elevation


West Elevation


South Elevation


East Elevation

SOLD TO:
AANDERSEN


\section*{| QUOTE DATE |
| :---: |
| $3 / 31 / 2021$ |}

CUSTOMER PO\# TRADEID
$\begin{array}{lrl} \\ \qquad \frac{\text { Location }}{\text { Unit } 4} & \frac{\text { Unit Price }}{} & \frac{\text { Ext. Price }}{} \\ \text { Unit Size }=431 / \mathbf{2}^{\prime \prime} \times 45 \text { 1/4" } & \$ 864.83 & \$ 1,729.66\end{array}$
Operation

| Abbreviated Quote Report - Customer Pricing |  |  |
| :---: | :---: | :---: |
| QUOTE NAME | PROJECT NAME | QUOTE NUMBER |
| Brawley | Brawley 1000 | 560440 |
| ORDER NOTES: |  |  |
| DELIVERY NOTES: |  |  |


| Abbreviated Quote Report - Customer Pricing |  |  |
| :---: | :---: | :---: |
| QUOTE NAME | PROJECT NAME | QUOTE NUMBER |
| Brawley | Brawley 1000 | 560440 |
| ORDER NOTES: |  |  |
| DELIVERY NOTES: |  |  |


Unit Size $=4 \mathbf{N}^{\prime \prime} \times 451 /{ }^{\prime \prime}$


| Abseviated Quote Report - Customer | Pricing |  |
| :---: | :---: | :---: |
| QUOTE NAME | PROJECT NAME | QUOTE NUMBER |
| Brawley | Brawley 1000 | 560440 |
| ORDER NOTES: |  |  |
| DELIVERY NOTES: |  |  | AA

 3148 South SR-446
Bloomington, IN 47401
 Item Qty 2
RO Size = 43 7/8" x 45 1/2"
WDHI 3' $71 / 2^{\prime \prime X} 3^{\prime} 9$ 1/4", Unit, 8 Degrees - Moderate, 400 Series Woodwright Double-Hung-WWI, Equal Sash, White Exterior
Frame, White Exterior Sash/Panel, Pine w/White - Painted Interior Frame, Pine w/White - Painted Interior Sash/Panel, AA, Dual Pane Low-E4 Standard Argon Fill Traditional, 2 Sash Locks White, White/WhiteJamb Liner, White, Full Screen, Aluminum

Insect Screen 1: 400 Series Woodwright Double-Hung-WWI, WDHI $43.5 \times 45.258$ Degrees - Moderate Full Screen Aluminum Comments:
Print Date: 4/1/2021 12:45:25 PM UTC
Height Area (Sq. Ft)
A1 -------------------------------------------------------
Page 1 of 20
Abbreviated Quote Report - Customer Pricing
TRADE ID

Unit Price Ext. Price

100GXO $3^{\prime} 31 / 2^{\prime \prime}$ X1' $^{\prime} 111 / 4^{\prime \prime}$, Unit, 100 Series Gliding XO/OX, No Flange w/Exterior Accessory Kerf (Insert), White Exterior Frame,
White Exterior Sash/Panel, w/White Interior Frame, w/White Interior Sash/Panel, Active/Stationary (XO), Dual Pane Low-E
Insect Screen 1: 100 Series Gliding XO/OX, 100GXO $39.5 \times 23.25$ Full Screen Fiberglass White
PROJECT NAME
Operation
Abbreviated Quote Report - Customer Pricing
TRADEID
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Iena ' $\forall$ erior Sash/Panel, AM,
 PROJECT NAME QUO

Insect Screen 1: 400 Series Woodwright Double-Hung-WWI, WDHI $27.5 \times 37.258$ Degrees - Moderate Full Screen Aluminum
Comments: Unit Size = 27 1/2" x 37 1/4"
AA
Unit 3

2

## RO Size = 27 7/8" x 37 1/2"

Item
300
DELIVERY NOTES:

QUOTE NAME
Brawley
ORDER NOTES: :
Abbreviated Quote Report - Customer Pricing
TRADEID
Lerime Exice
$\$ 954.68 \quad \$ 954.68$ Or, White, 2604, Full, Fiberglass
Location

Abbreviated Quote Report - Customer Pricing

$$
\text { Unit Size = 28" x } 69 \text { 1/2" }
$$

Unit Price Ext. Price
‘әшеля доиәəхヨ әң!
 E4 Standard Argon Fill Finelight Grilles-Between-the-Glass 3 Wide, 2 High, Specified Equal Light Pattern, White, w/White, 3/4" Grille Bar, No Traditional, 1 Sash Locks White, White/WhiteJamb Liner, White, Full Screen, Aluminum PROJECT NAME
Brawley 1000
Abbreviated Quote Report - Customer Pricing


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\angle L \cdot 8 z z^{\prime}!\$
$$

TRET 4' 5"X5' 9 1/2", Unit, 8 Degrees and greater, E-Series Double-Hung Insert, Equal Sash, $31 / 4$ "Frame Depth, White 2604 Exterior Frame, Specified Equal Light Pattern, White, w/White, 1" Grille Bar, Ovolo Glass Stop 2 Sash Locks White, WhiteJamb Liner, Clad Exterior / Wood InteriorJamb Liner Inserts, YesPunched Jamb Liner, White, 2604, Full, Fiberglass
Insect Screen 1: E-Series Double-Hung Insert, TRET $53 \times 69.58$ Degrees and greater Full Fiberglass White 2604
Abbreviated Quote Report - Customer Pricing


| Unit \# | U-Factor | WDHI 3' 8"X5' 9 1/2", Unit, 8 Degrees - Moderate, 400 Series Woodwright Double-Hung-WWI, Equal Sash, White Exterior Frame, White Exterior Sash/Panel, Pine w/White - Painted Interior Frame, Pine w/White - Painted Interior Sash/Panel, AA, Dual Pane LowE4 Standard Argon Fill Finelight Grilles-Between-the-Glass 4 Wide, 2 High, Specified Equal Light Pattern, White, w/White, 3/4" Grille Bar, No Traditional, 1 Sash Locks White, White/WhiteJamb Liner, White, Full Screen, Aluminum |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Insect Screen 1: 400 Series Woodwright Double-Hung-WWI, WDHI $44 \times 69.58$ Degrees - Moderate Full Screen Aluminum White |  |  |  |  |  |
|  |  | SHGC | Clear Opening/Unit \# | Width | Height | Area (Sq. Ft) | Comments: |
| A1 | 0.3 | 0.28 | A1 | 0.00000 | 0.00000 | 0.00000 |  |

Abbreviated Quote Report - Customer Pricing

Abbreviated Quote Report - Customer Pricing


| Unit \# | U-Factor | WDHI 3' 8"X5' 9 1/2", Unit, 8 Degrees - Moderate, 400 Series Woodwright Double-Hung-WWI, Equal Sash, White Exterior Frame, White Exterior Sash/Panel, Pine w/White - Painted Interior Frame, Pine w/White - Painted Interior Sash/Panel, AA, Dual Pane LowE4 Standard Argon Fill Finelight Grilles-Between-the-Glass 4 Wide, 2 High, Specified Equal Light Pattern, White, w/White, 3/4" Grille Bar, No Traditional, 1 Sash Locks White, White/WhiteJamb Liner, White, Full Screen, Aluminum |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Insect Screen 1: 400 Series Woodwright Double-Hung-WWI, WDHI $44 \times 69.58$ Degrees - Moderate Full Screen Aluminum White |  |  |  |  |  |
|  |  | SHGC | Clear Opening/Unit \# | Width | Height | Area (Sq. Ft) | Comments: |
| A1 | 0.3 | 0.28 | A1 | 0.00000 | 0.00000 | 0.00000 |  |

Abbreviated Quote Report - Customer Pricing
TRADEID
100GXO 2' 8"X3' 5", Unit, 100 Series Gliding XO/OX, No Flange w/Exterior Accessory Kerf (Insert), White Exterior Frame, White Exterior Sash/Panel, w/White Interior Frame, w/White Interior Sash/Panel, Active/Stationary (XO), Dual Pane Low-E Standard Argon Fill Auto Lock, Andersen 100 Series, 1 Sash Locks White, White, Full Screen, Fiberglass
Insect Screen 1: 100 Series Gliding XO/OX, 100GXO $32 \times 41$ Full Screen Fiberglass White
Comments:
Unit \# U---------------------------------------
A1 $\quad 12.2890 \quad 37.5000 \quad 3.20030$
Print Date: 4/1/2021 12:45:26 PM UTC
Abbreviated Quote Report - Customer Pricing
TRADEID
-
Unit Price Ext. Price
$\$ 587.81 \quad \$ 587.81$



PROJECT NAME
Brawley 1000
560440

> Operation
\#Od yヨwolsno
Insect Screen 1: 100 Series Gliding XO/OX, $100 \mathrm{GXO} 56 \times 53$ Full Screen Fiberglass White

$$
\text { Height } \quad \text { Area (Sq. Ft) }
$$

A1 ------------------------------------------------------------300
Print Date: 4/1/2021 12:45:26 PM UTC
Abbreviated Quote Report - Customer Pricing

$$
\begin{aligned}
& \text { PROJECT NAME } \\
& \text { Brawley } 1000
\end{aligned}
$$ Exterior / Wood InteriorJamb Liner Inserts, YesPunched Jamb Liner, White, 2604, Full, Fiberglass

TRET 4' 5"X5' 1 1/4", Unit, 8 Degrees and greater, E-Series Double-Hung Insert, Equal Sash, 3 1/4" Frame Depth, White 2604 Exterior Frame, White 2604 Exterior Sash/Panel, Pine w/White - Painted Interior Frame, Pine w/White - Painted Interior
Sash/Panel, Active/Active, Dual Pane Low-E4 Standard Argon Fill Contour Finelight Grilles-Between-the-Glass 6 Wide, 2 High,


## Unit Size = 53" x 61 1/4"

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$$


Unit \# U----------------------------------
Print Date: 4/1/2021 12:45:26 PM UTC
Abbreviated Quote Report - Customer Pricing

$$
\text { Unit Size = } 443 / 4 " \text { x } 61 \text { 1/4" }
$$ WDHI $3^{\prime} 8$ B/4"X5' 1 1/4", Unit, 8 Degrees - Moderate, 400 Series Woodwright Double-Hung-WWI, Equal Sash, White Exterior

Frame, White Exterior Sash/Panel, Pine w/White - Painted Interior Frame, Pine w/White - Painted Interior Sash/Panel, AA, Dual Frame, White Exerio
w/White, 3/4" Grille Bar, No Traditional, 1 Sash Locks White, White/WhiteJamb Liner, White, Full Screen, Aluminum
Insect Screen 1: 400 Series Woodwright Double-Hung-WWI, WDHI $44.75 \times 61.258$ Degrees - Moderate Full Screen Aluminum

$$
\begin{array}{lc}
\frac{\text { Item }}{1300} \quad \frac{\text { Qty }}{1} \\
\text { RO Size }=45 & 1 / 8^{\prime \prime} \times 61 \\
\text { 1/2" }
\end{array}
$$

uo!̣edado White
Abbreviated Quote Report - Customer Pricing

Abbreviated Quote Report - Customer Pricing
 Exterior / Wood InteriorJamb Liner Inserts, YesPunched Jamb Liner, White, 2604, Full, Fiberglass

Sash/Panel, Active/Active, Dual Pane Low-E4 Standard Argon Fill Contour Finelight Grilles-Between-the-Glass 6 Wide, 2 High, Specified Equal Light Pattern, White, w/White, 1" Grille Bar, Ovolo Glass Stop 2 Sash Locks White,
Exterior / Wood InteriorJamb Liner Inserts, YesPunched Jamb Liner, White, 2604, Full, Fiberglass
Unit Size = 53" x 61 1/4"

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& \text { ill Fiberglass White } 2604 \\
& \text { Comments: }
\end{aligned}
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Insect Screen 1: E-Series Double-Hung Insert, TRET $53 \times 61.258$ Degrees and greater Full Fiberglass White 2604
Unit \# U-Factor SHGC
----------------------------------------
Print Date: 4/1/2021 12:45:26 PM UTC
Abbreviated Quote Report - Customer Pricing WDHI $3^{\prime} 8$ 8/4"X5' 1 1/4", Unit, 8 Degrees - Moderate, 400 Series Woodwright Double-Hung-WWI, Equal Sash, White Exterior
Frame, White Exterior Sash/Panel, Pine w/White - Painted Interior Frame, Pine w/White - Painted Interior Sash/Panel, AA, Dual Frame, White Exer
w/White, 3/4" Grille Bar, No Traditional, 1 Sash Locks White, White/WhiteJamb Liner, White, Full Screen, Aluminum
Insect Screen 1: 400 Series Woodwright Double-Hung-WWI, WDHI $44.75 \times 61.258$ Degrees - Moderate Full Screen Aluminum White
Unit \# U-Factor SHGC

Abbreviated Quote Report - Customer Pricing

Abbreviated Quote Report - Customer Pricing

| QUOTE NAME |  |  | PROJECT NAME | QUOTE NUMBER |  | CUSTOMER PO\# | TRADE ID |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Brawley |  | Brawley 1000 |  |  |  |  |  |
| ORDER NOTES: |  |  |  |  |  |  |  |  |
|  |  | Item | Qty | Operation |  | Location | Unit Price | Ext. Price |
|  |  | 1800 | 1 | AA |  | Unit 5 | \$960.09 | \$960.09 |
|  |  | RO Size = 37 1/8" x 61 1/2" |  | Unit Size = 36 3/4" $\times 61$ 1/4" |  |  |  |  |
|  |  | WDHI 3' 3/4"X5' 1 1/4", Unit, 8 Degrees - Moderate, 400 Series Woodwright Double-Hung-WWI, Equal Sash, White Exterior Frame, White Exterior Sash/Panel, Pine w/White - Painted Interior Frame, Pine w/White - Painted Interior Sash/Panel, AA, Dual Pane Low-E4 Standard Argon Fill Traditional, 1 Sash Locks White, White/WhiteJamb Liner, White, Full Screen, Aluminum |  |  |  |  |  |  |
|  |  | Insect Screen 1: 400 Series Woodwright Double-Hung-WWI, WDHI $36.75 \times 61.258$ Degrees - Moderate Full Screen Aluminum White |  |  |  |  |  |  |
| Unit \# | U-Factor | SHGC | Clear Opening/Unit \# | Width | Height | Area (Sq. Ft) |  |  |
| A1 | 0.3 | 0.31 | A1 | 0.00000 | 0.00000 | 0.00000 |  |  |

Abbreviated Quote Report - Customer Pricing

Quote \#: 560440
All Images Viewed from Exterior

Comments:
> * All graphics as viewed from the exterior. ** Rough opening dimensions are minimums and may need to be increased to allow for use of building wraps or flashings or sill panning or brackets or fasteners or other items.

> Thank you for choosing Andersen Windows \& Doors

pg. 35 - Windows - Creative expression with fenestration is not precluded provided the result does not conflict with or draw attention from surrounding historic buildings

## Staff Recommendation:Approval

This project has gone through multiple iterations and the addition constitutes an extensive new construction facing the main right of way. The placement of the house in the lot and the multiple alterations to it have made placing an addition challenging. The proposed addition is visible from the right of way. However, the design follows the pattering, porch placement, and scaling recommendations within the guidelines.

The proponent has worked with the neighborhood construction subcommittee to find an alternative that would work for both the owner and the community.

# APPLICATION FORM <br> CERTIFICATE OF APPROPRIATENESS 

Case Number: $\qquad$
Date Filed:
2/24/2022

Scheduled for Hearing: 3/10/2022

# Address of Historic Property: <br> 208 E. 16th St. Bloomington, IN 47408 

Petitioner's Name: Lisa Freeman
Petitioner's Address:
1106 E. Berkshire Ct. Bloomington, IN 47401

Phone Number/e-mail:
312-213-0614 Lfrivernorth@yahoo.com
owner's Name: Betty B. Freeman Revocable Trust
Owner's Address: 1106 E. Berkshire Ct. Bloomington, IN 47408
Phone Number/e-mail: Same

## Instructions to Petitioners

The petitioner must attend a preliminary meeting with staff of the Department of Housing and Neighborhood Development during which the petitioner will be advised as to the appropriateness of the request and the process of obtaining a Certificate of Appropriateness. The petitioner must file a "complete application" with Housing and Neighborhood Department Staff at least twelve (12) days before a scheduled regular meeting. The Historic Preservation Commission meets the second Thursday of each month at 5:00 P.M. in the McCloskey Room (meetings are currently held via Zoom until further notice. The link is sent the week before the meeting). The petitioner or his designee must attend the scheduled meeting in order to answer any questions or supply supporting material. You will be notified of the Commission's decision and a Certificate of Appropriateness will be issued to you. Copies of the Certificate must accompany any building permit application subsequently filed for the work described. If you feel uncertain of the merits of your petition, you also have the right to attend a preliminary hearing, which will allow you to discuss the proposal with the Commission before the hearing during which action is taken. Action on a filing must occur within thirty days of the filing date, unless a preliminary hearing is requested.

## Please respond to the following questions and attach additional pages for photographs, drawings, surveys as requested.

A "Complete Application" consists of the following:

1. A legal description of the lot. Parcel \# 53-05-33-202-041.000-005
2. A description of the nature of the proposed modifications or new construction: Full remodel of existing single family home; adding $1 / 2$ story dormer
Additional 363.4 square footage will be added to the front of the home
Existing garage will remain
Existing ' Y ' concrete sidewalk in the yard will remain
Adding approximately 40" tall Allan Block retaining wall; limestone color
3. A description of the materials used.

Certainteed Mainstreet Vinyl Siding- Double 4" Clapboard Charcoal Gray
Malarkey Dimensional Asphalt Shingle- Highlander NEX- Midnight Black
Midway Alliance Double Hung Vinyl Windows- Bronze
Concrete porch, steps and landing
4. Attach a drawing or provide a picture of the proposed modifications. You may use manufacturer's brochures if appropriate.
5. Include a scaled drawing, survey or geographic information system map showing the footprint of the existing structure and adjacent thoroughfares, Geographic Information System maps may be provided by staff if requested. Show this document to Planning Department Staff in order to ascertain whether variances or zoning actions are required.
6. Affix at least three photographs showing the existing full facade at each street frontage and the area of modification. If this petition is a proposal for construction of an entirely new structure or accessory building, include photographs of adjacent properties taken from the street exposure.

If this application is part of a further submittal to the Board of Zoning Appeals for a Conditional Use or development standard variance, please describe the use proposed and modification to the property which will result.








# MainStreet ${ }^{\text {mT}}$ 

## Siding



# Choose exceptional value with versatility. 

7 styles. 25 colors. MainStreet's attractive, feature-rich siding is the ideal choice for your home. Designed to stay beautiful with very little effort, MainStreet offers unparalleled versatility to design your home based on your unique taste with durability and the benefits of low-maintenance living.


## Enjoy the benefits of consistent quality.

Not all vinyl siding is the same. A building industry leader for over 100 years, CertainTeed offers a lifetime limited warranty based on MainStreet's quality features - RigidForm ${ }^{\top M}$ technology for reinforced performance, PermaColor ${ }^{\text {TM }}$ for lifetime fade protection and STUDfinder ${ }^{T M}$ for precision installation.

Lifetime Limited Warranty


## $\int$ <br> Rollover <br> Nail Hem

Partial Rollover Nail Hem technology stiffens siding for a straighter-on-thewall appearance. Designed and tested to withstand windload pressures up to 170 mph .
*Products adhere to ASTM D3679 standards for capable wind speed ratings based on standard wind load design pressure ratings. For most current ratings, please reference www.certainteed.com. Textures

Natural cedar (woodgrain) or freshly painted (brushed)finishes.

## $?$

 DuraLock ${ }^{\circledR}$This locking system snaps tight for a

3" CLAPBOARD


5" CLAPBOARD

## 7 Styles. Great features.



MainStreet consists of traditional styles with European roots: Clapboard, Beaded and Dutchlap. The Clapboard style is the most traditional and found in all parts of the United States. Beaded siding is very popular style for homes in the Southern Coastal regions. The Dutchlap style provides strong shadow lines and is highly popular in the Mid-Atlantic region.

## 4" Dutchlap Lap Siding Woodgrain <br> 保

## MainStreet is better...


...for color availability.


## ...for safety.

STUDfinder ${ }^{\text {TM }}$ is an installation system with letters on the MainStreet's panel nail hem to ensure proper nailing to wood studs, to protect you from unwanted dangers such as damaged pipes or wires, or exposed nails.


When installed with MainStreet siding, CertaWrap ${ }^{\text {TM }}$ Weather Resistant Barrier is the added layer of protection against air and moisture damage.

## .for peace of mind.



Warranty
MainStreet has a lifetime limited warranty.

## Trusted Brand

CertainTeed siding is the brand preferred by building professionals and homeowners, from surveys conducted by national trade magazines. CertainTeed is an industry leader for over 100 years.

## Sustainable

CertainTeed vinyl siding offers significantly lower environmental impact than other cladding options. ${ }^{\dagger}$
+Based on life cycle assessment studies conducted through the National Institute of Standards and Technology (NIST)

## We can help with your decisions.

## What is your color and design comfort level?



Color and Design Tools www.certainteed.com/colortools

## NOVICE

You are not sure about colors and are not sure where to start.

## ColorCoach ${ }^{\text {TM }}$

Gives you
a virtual swatchbook to get started.

## Trim-It ${ }^{\text {TM }}$

Creates distinction with a wide offering of accent and decorative trim products from both composite and vinyl product lines.


## INTERMEDIATE

You understand color and enjoy experimenting with color combinations but aren't exactly sure which color direction you want to go.

COLOR VIIEW

## Online

Mix and match colors and styles on a wide variety of pre-populated home styles to get ideas.


## EXPERT

You already know what colors you want to use, but would like to see how the products available in your color theme will look together on your home.

COLOR VIEW

## DIY

Immediately begin designing by uploading a project picture and quickly mix and match products on
 your own project.

## Pro

Have a photo of your home professionally masked in a few days
so you can
visualize in ColorView tool


CertainTeed products are designed to work together and complement each other in color and style to give your home a beautiful finished look.


Malarkey Asphalt Dimensional Shingle
Highlander NEX

Midnight Black



(1) Double-wall, integral "J" channel: Designed into the frame, eliminating the cost of an add-on "J" channel while providing a pleasing "beveled" exterior look.
(2) Heavy walled PVC framing acts as a natural insulator.
(3) Dead air spaces within the frame and sash profiles further resist energy flow.
(4) Closed cell compression seal at sloped sill resists air and water penetration.
5 Triple-fin seal weather stripping at sill further reduces air infiltration.
(6) $3 / 4$ " Insulating glass provides optimum energy efficiency.
$(5$ "Warm edge" low conductance spacer resists energy flow through the edge of glass.
8 Water management grooves channel moisture away from insulated glass sealant.
(9) Dual hollows at lift rail add strength and insulation.
(10) Optional InnovativE® High Performance Glass utilizes Low E coating specifically engineered for local requirements.
(1) Direct set back bedding bonds glass to sash, reducing air and water infiltration potential.
(12) Rigid screen pocket on sill reduces "screen rattle," even on windy days.

## Casements/Awnings

- Sash opens completely, so windows can be cleaned easily from inside your home*
- All components are corrosion resistant, providing years of trouble-free performance
- Multi-Point locking system locks sash at multiple points for utmost security
- Three layers of weather stripping assure effective barrier to air and water penetration
- Optional in some regions, multiple units made with single frame construction


## Fixed Units

- Mulling system allows fixed units to be mulled to any other window
- Equal sight lines assure uniform exterior appearance of all units


## Sliders

- Heavy duty brass rollers assure effortless sash travel
- Roller housing transfers weight of glass directly to frame, reducing stress on sash members
- Independent weep chambers on frame assure effective water runoff
- Stylish beveled exterior matches look of doublehung and casement, to provide a uniform exterior appearance

[^0]Double-Hung Window


5


| STAFF |  |
| :--- | :--- |
| RECOMMENDATIONS | Address: 916 S Morton St. |
| ROA 22-20 |  |

# APPLICATION FORM CERTIFICATE OF APPROPRIATENESS 

| Case Number: | COA 22-20 |
| :--- | :--- |
| Date Filed: | $2 / 24 / 2022$ |
| Scheduled for Hearing: | $3 / 10 / 2022$ |

Address of Historic Property: 916 S Morton Street, Bloomington, IN 47403
Petitioner's Name: Barre Klapper, Springpoint Architects
Petitioner's Address: $\quad 213$ S Rogers St, Ste. 5, Bloomington, IN 47404
Phone Number/e-mail: 812-322-4401/barre@springpointarchitects.com
Owner's Name: Wayne \& Dee Dee Poole
Owner's Address: $\quad 916$ S Morton Street, Bloomington, IN 47403

Phone Number/e-mail: 317-997-5586/poolewd2020@gmail.com

Instructions to Petitioners

The petitioner must attend a preliminary meeting with staff of the Department of Housing and Neighborhood Development during which the petitioner will be advised as to the appropriateness of the request and the process of obtaining a Certificate of Appropriateness. The petitioner must file a "complete application" with Housing and Neighborhood Department Staff no later than seven days before a scheduled regular meeting. The Historic Preservation Commission meets the second Thursday of each month at 5:00 P.M. in the McCloskey Room. The petitioner or his designee must attend the scheduled meeting in order to answer any questions or supply supporting material. You will be notified of the Commission's decision and a Certificate of Appropriateness will be issued to you. Copies of the Certificate must accompany any building permit application subsequently filed for the work described. If you feel uncertain of the merits of your petition, you also have the right to attend a preliminary hearing, which will allow you to discuss the proposal with the Commission before the hearing during which action is taken. Action on a filing must occur within thirty days of the filing date, unless a preliminary hearing is requested.

## Please respond to the following questions and attach additional pages for photographs, drawings, surveys as requested.

## A "Complete Application" consists of the following:

1. A legal description of the lot. $015-08290-00 \mathrm{M}$ M Campbells Lot 17
2. A description of the nature of the proposed modifications or new construction:

The project is a 542 SF owner's suite addition on the north side of the existing house. The addition is located toward the back half of the house to allow 2 of the 3 existing window openings on the north elevation to remain open. The addition is a smaller, front facing gable parallel to the main house gable and attached to the house with a small connector with a cross gable roof. A shallow, cantilevered bay at the front of the addition echoes the existing bay on the south side of the house. The bracket element which has been introduced at the revised front porch and new garage would be located on the bay. The 4" siding exposure of the main part of the bay would match the house while an 8 " siding exposure at the connector and bay further distinguishes the addition from the house.
3. A description of the materials used.

Reference materials list on drawings.
4. Attach a drawing or provide a picture of the proposed modifications. You may use manufacturer's brochures if appropriate.
5. Include a scaled drawing, survey or geographic information system map showing the footprint of the existing structure and adjacent thoroughfares, Geographic Information System maps may be provided by staff if requested. Show this document to Planning Department Staff in order to ascertain whether variances or zoning actions are required.
6. Affix at least three photographs showing the existing full facade at each street frontage and the area of modification. If this petition is a proposal for construction of an entirely new structure or accessory building, include photographs of adjacent properties taken from the street exposure.

If this application is part of a further submittal to the Board of Zoning Appeals for a Conditional Use or development standard variance, please describe the use proposed and modification to the property which will result.





VIEW FROM EAST


VIEW FROM NORTHWEST
POOLE RESIDENCE
916 S. MORTON STREET
springpoint

# MEMORANDUM OF AGREEMENT BETWEEN THE FEDERAL HIGHWAY ADMINISTRATION AND THE INDIANA STATE HISTORIC PRESERVATION OFFICER SUBMITTED TO THE ADVISORY COUNCIL ON HISTORIC PRESERVATION PURSUANT TO 36 C.F.R. Section 800.6(b)(iv) REGARDING THE INTERSECTION IMPROVEMENT PROJECT IN BLOOMINGTON, BLOOMINGTON TOWNSHIP, MONROE COUNTY, INDIANA DES. NO. 1800199 (Lead) 

WHEREAS the Federal Highway Administration ("FHWA") proposes to proceed with the SR 45 and Pete Ellis Drive (Dr.)/Discovery Parkway (formerly North Range Road) Intersection Improvement and SR 45 Added Lanes Project in Bloomington, Bloomington Township, Monroe County, Indiana; and

WHEREAS the FHWA, in consultation with the Indiana State Historic Preservation Officer ("Indiana SHPO"), has defined the undertaking's area of potential effects ("APE"), as the term is defined in 36 C.F.R. Section 800.16(d), to encompass the area illustrated on the aerial photograph attached to this document as "Attachment A"; and

WHEREAS the FHWA, in consultation with the Indiana SHPO, has found that Hinkle Garton Farmstead (NR-1057/NR-1892) is within the APE; and

WHEREAS the FHWA and the Indiana SHPO both recognize that Hinkle Garton Farmstead (NR-1057/NR-1892) is listed on the National Register of Historic Places ("National Register"); and

WHEREAS the FHWA, in consultation with the Indiana SHPO, has determined pursuant to 36 C.F.R. Section 800.5(a) that the intersection improvements will have an adverse effect on Hinkle Garton Farmstead and

WHEREAS the FHWA has consulted with the Indiana SHPO in accordance with Section 106 of the National Historic Preservation Act (54 U.S.C. § 306108) and its implementing regulations (36 C.F.R. Section 800) to resolve the adverse effect on Hinkle Garton Farmstead (NR-1057/NR1892); and

WHEREAS the public was given an opportunity to comment on the undertaking's adverse effect in a notice published on October 13, 2021 in the The Herald Times (Monroe Co. IN); and

WHEREAS the FHWA has notified the Advisory Council on Historic Preservation ("Council") of the adverse effect and invited the Council's participation in the project, pursuant to 36 CFR Section 800.6(a)(1), in a letter dated October 18, 2021; and

Or, WHEREAS the Council declined to participate in consultation through lack of response to the FHWA's invitation within fifteen (15) days; and

WHEREAS the FHWA, in consultation with the Indiana SHPO, has invited the Indiana Department of Transportation ("INDOT") to participate in the consultation and to become a signatory to this memorandum of agreement; and

WHEREAS the FHWA, in consultation with the Indiana SHPO, has invited the Bloomington Restorations, Inc. to participate in the consultation and to become a signatory to this memorandum of agreement; and

WHEREAS the FHWA, in consultation with the Indiana SHPO, has invited Indiana Landmarks to participate in the consultation and to become a concurring party to this memorandum of agreement; and

WHEREAS the FHWA has determined that with regard to Section 4(f) resources, a net benefit is achieved when the transportation use, the measures to minimize harm, and the mitigation incorporated into the project results in an overall enhancement of the Section 4(f) property when compared to both the future do-nothing or avoidance alternatives and the present condition of the Section 4(f) property, considering the activities, features and attributes that qualify the property for Section 4(f) protection; and

WHEREAS the FWHA has determined that this project has a net benefit on Hinkle Garton Farmstead (NR-1057/NR-1892), a Section 4(f) resource from which a small amount of right-ofway will be required and of which a conversion to a transportation use will occur; and

WHEREAS the SHPO signature serves as a concurrence in the use of the Net Benefit Programmatic 4(f) for this resource; and

WHEREAS the FHWA has consulted with the Indiana SHPO in accordance with Section 106 of the National Historic Preservation Act (16 U.S.C. 470f) and its implementing regulations (36 C.F.R. Part 800) concerning the scope of work as presented in the materials and plans dated October 8, 2021, and has agreed to proceed with the project as proposed

NOW, THEREFORE, the FHWA and the Indiana SHPO agree that, upon the submission of a copy of this executed memorandum of agreement, as well as the documentation specified in 36 C.F.R. Section 800.11(e) and (f) to the Council pursuant to 36 C.F.R. Section 800.6[b][1][iv]) and upon the FHWA's approval of the intersection improvements, the FHWA shall ensure that the following stipulations are implemented in order to take into account the effect of the SR 45 and Pete Ellis Drive (Dr.)/Discovery Parkway (formerly North Range Road) Intersection Improvement and SR 45 Added Lanes Project on historic properties.

## I. MITIGATION STIPULATIONS

The FHWA, in coordination with INDOT, shall ensure that the following measures are carried out:
A. The Indiana Department of Transportation (INDOT) will build an ADA compliant multi-use path along the south side of $10^{\text {th }}$ Street/State Road 45 and doing so in
such a way as to minimize the need for grading in front of the Hinkle-Garton Farmstead. The following items concerning the construction of the multi-use path are noted on the plan sheets attached to this document as "Attachment B":
i. Care will be made to avoid disturbances of roots of the row of mature maple trees that line the frontage and will provide a separation between the highway and the farmstead.
ii. Care will be made to avoid disturbing the historic garage structure adjacent to the roadway, limestone marker broken off at ground level about 50 feet east of the carriage house/garage, limestone post on the east side of the driveway to the main house and the northwest corner of the garage.
B. INDOT will provide reimbursement to Bloomington Restorations, Inc., property owner of the Hinkle-Garton Farmstead, for the rehabilitation/repair and repainting of the historic main house on the property. The cost is estimated at approximately $\$ 40,000.00$. This work will be done before the intersection improvements begin and payment to Bloomington Restorations, Inc. will be made via reimbursement in an amount not to exceed $\$ 40,000.000$. The reimbursement will be provided through the execution of an agreement between INDOT and Bloomington Restorations, Inc.
C. INDOT will ensure the approximate 150 -foot existing wood fence located along SR 45 ( $10^{\text {th }}$ Street) east of the barn to about 350 feet west of N Pete Ellis Dr. will be relocated and reset in consultation with property owner, Bloomington Restorations, Inc.
D. Tree Clearing and Replacement
i. INDOT and/or its representatives shall consult with the property owners of the Hinkle-Garton Farmstead, Bloomington Restorations, Inc., and if appropriate and given consent by the property owner, INDOT and/or its representatives will replace mature trees within the historic boundary of the property that must be removed for the construction of this project.
ii. INDOT and/or its representatives shall make a good faith effort to replace trees with matching species such as pecan (Carya illinoinensis), persimmon (Diospyros virginiana), butternut (Juglans cinerea), and chestnut (Castanea), or an alternative species approved by the property owner, where reasonably feasible.
iii. INDOT and/or its representatives shall make a good faith effort to replace the trees at a 1:1 ratio or as close to a 1:1 ratio as reasonable.
iv. When available, but before performing work within the Hinkle-Garton Farmstead historic property boundary, INDOT and/or its representatives shall present a tree clearing and replacement plan to consulting parties.
v. The tree clearing and replacement plan shall identify the location and species of the trees to be removed as part of this project and the location and species of replacement trees. Trees shall be planted far enough from the sidewalk to minimize debris.
vi. Indiana SHPO and consulting parties will have thirty (30) days to review and comment on the plans. If the Indiana SHPO does not respond to this submission within thirty (30) days, acceptance will be assumed.
vii. If the Indiana SHPO or any consulting party responds with recommendations, a good faith effort to accommodate the recommendation will be made. FHWA/INDOT and/or its representatives will inform the Indiana SHPO and consulting parties of its response to such recommendations and submit any revisions for their records.
viii. INDOT and/or its contractor shall remove existing vegetation and replant in accordance with the approved tree clearing and replacement plan within 2 years of construction letting. INDOT shall coordinate with Bloomington Restorations, Inc. prior to and during work on the property.
ix. INDOT and/or its contractor shall inspect and monitor the mitigative plantings following the INDOT Standard Specifications for Care, Inspection, and Replacement of Plant Materials (INDOT Spec 622.18) attached as Exhibit A.
x. Bloomington Restorations, Inc. will provide INDOT and/or its contractor with right-of-entry to the property during mitigation implementation and subsequent monitoring.
xi. After completion of the replanting of replacement trees, INDOT and/or its representatives will provide documentation to that effect to consulting parties.

## II. OBJECTION RESOLUTION PROVISION

Disagreement and misunderstanding about how this memorandum of agreement is or is not being implemented shall be resolved in the following manner:
A. If the Indiana SHPO or any invited signatory to this memorandum of agreement should object in writing to the FHWA regarding any action carried out or proposed with respect to the intersection improvements or implementation of this memorandum of agreement, then the FHWA shall consult with the objecting party to resolve this objection. If after such consultation the FHWA determines that the objection cannot be resolved through consultation, then the FHWA shall forward all documentation relevant to the objection to the Council, including the FHWA's proposed response to the objection. Within 45 days after receipt of all pertinent documentation, the Council shall exercise one of the following options:
i. Provide the FHWA with a staff-level recommendation, which the FHWA shall take into account in reaching a final decision regarding its response to the objection; or
ii. Notify the FHWA that the objection will be referred for formal comment pursuant to 36 C.F.R. Section 800.7(c) and proceed to refer the objection and comment. The FHWA shall take into account the Council's comments in reaching a final decision regarding its response to the objection.
B. If comments or recommendations from the Council are provided in accordance with this stipulation, then the FHWA shall take into account any Council comment or recommendations provided in accordance with this stipulation with reference only to the subject of the objection. The FHWA's responsibility to carry out all actions under the memorandum of agreement that are not the subjects of the objection shall remain unchanged.

## III. POST-REVIEW DISCOVERY

In the event that one or more historic properties--other than Hinkle Garton Farmstead-are discovered or that unanticipated effects on historic properties are found during the implementation of this memorandum of agreement, the FHWA shall follow the procedure specified in 36 C.F.R. Section 800.13, as well as IC 14-21-1-27 and IC 14-21-1-29, by stopping work in the immediate area and informing the Indiana SHPO and the INDOT Cultural Resources Office of such unanticipated discoveries or effects within two (2) business days. Any necessary archaeological investigations will be conducted according to the provisions of IC 14-21-1 and 312 IAC 21, and the most current Guidebook for Indiana Historic Sites and Structures Inventory - Archaeological Sites.

## IV. AMENDMENT

Any signatory to this memorandum of agreement may request that it be amended, whereupon the parties shall consult to consider the proposed amendment. 36 C.F.R. 800.6(c)(7) shall govern the execution of any such amendment.

## V. TERMINATION

A. If the terms of this memorandum of agreement have not been implemented by December 31, 2026, then this memorandum of agreement shall be considered null and void. In such an event, the FHWA shall so notify the parties to this memorandum of agreement and, if it chooses to continue with the intersection improvements then it shall reinitiate review of the intersection improvements in accordance with 36 C.F.R. Sections 800.3 through 800.7.
B. Any signatory to this memorandum of agreement may terminate it by providing thirty (30) days notice to the other parties, provided that the parties shall consult during the period prior to termination to seek agreement on amendments or other actions that would avoid termination. In the event of termination, the FHWA shall comply with 36 C.F.R. Sections 800.3 through 800.7 with regard to the review of the intersection improvements
C. In the event that the FHWA does not carry out the terms of this memorandum of agreement, the FHWA shall comply with 36 C.F.R. Sections 800.3 through 800.7 with regard to the review of the intersection improvements.

The execution of this memorandum of agreement by the FWHA, the Indiana SHPO, Bloomington Restorations, and Indiana Landmarks, the submission of it to the Council with the appropriate documentation specified in 36 C.F.R. Section 800.11(e) and (f), and the implementation of its terms evidence that the FHWA has afforded the Council an opportunity to comment on the intersection improvements and its effect on historic properties and that the FHWA has taken into account the effects of the intersection improvements on historic properties.

## SIGNATORIES (required):

FEDERAL HIGHWAY ADMINISTRATION
INDIANA STATE HISTORIC PRESERVATION OFFICER
INVITED SIGNATORIES:
INDIANA DEPARTMENT OF TRANSPORTATION
BLOOMINGTON RESTORATIONS, INC.
INVITED CONCURRING PARTIES:
Indiana Landmarks

## REQUIRED SIGNATORY

FEDERAL HIGHWAY ADMINISTRATION

By:
Jermaine R. Hannon, Division Administrator

## REQUIRED SIGNATORY

INDIANA STATE HISTORIC PRESERVATION OFFICER

By:
 Date: 01/27/2022
Beth K. McCord, Deputy State Historic Preservation Officer

## INVITED SIGNATORY

## INDIANA DEPARTMENT OF TRANSPORTATION

## By: SHA

Date: 1/14/2022

## INVITED SIGNATORY

BLOOMINGTON RESTORATIONS, INC.

By:
Steve Wyatt, Executive Director

## CONCURRING PARTY

INDIANA LANDMARKS

By:
Date:
Mark Dollase, Vice President of Preservation Services

Addendum APE Map (1:6,834) Intersection Improvement Project
SR 45 at Peter Ellis Dr. and SR 45 Added Travel Lanes
Des. No. 1800199 and 1800086




point itself to 2 ft beyond the stub stakes of the guy wires or 2 ft beyond the mulched area. In general, these areas shall be in accordance with the plans.

### 622.18 Care, Inspection, and Replacement

## (a) Care

Watering, fertilizing, weeding, cultivating, spraying to control insect infestation and disease, and all other good horticultural practices necessary to maintain the plants in a living healthy condition shall be performed up to the time for termination of responsibility for care as set out herein. The plants shall be cared for throughout the life of the contract. All plants stolen, damaged, or destroyed by fire, automobiles, vandalism, or any other cause, with the exception of plants damaged or destroyed by Department maintenance operations, shall be replaced with no additional payment as soon as practicable. Plants damaged or destroyed by the Department will be replaced by the Department prior to the date of final acceptance.
(b) Inspection and Replacement

On or about May 1, a spring inspection of initial plantings will be made during and before the end of the planting season and prior to the beginning of the establishment period. Plants not living, unhealthy, in a poor growing condition, or otherwise not meeting the specifications shall be replaced with no additional payment, prior to May 15 for trees and prior to May 25 for other plants. These replacements shall be in accordance with all other requirements of the initial planting. All plants found to be not living or in an unhealthy condition between this replacement and final inspection shall be removed from the project immediately, as directed, and shall be replaced after September 15 as detailed below.

A fall inspection will be made on or about September 15, at which time the condition of the materials planted within the specified planting season will be determined. At the time of this inspection, all plants which are found to be dead, unhealthy, in a poor growing condition, or otherwise not meeting the specifications will be rejected. Rejected plants shall be removed and disposed of as soon as practicable and replaced prior to November 15 with no additional payment. Replacement materials and operations shall be in accordance with the requirements of the initial planting.

A final inspection of the contract will be made as soon as possible after replacement. All plants shall be cared for and maintained until final inspection and acceptance.

All seedlings for wildlife habitat shall be in accordance with ASNS Seedling Trees and Shrubs and will be inspected by a landscape architect within one week of planting. Spring and fall inspections as described above will not be required. The inspection, planting, and maintenance of seedlings as required will constitute final acceptance.

# The property at 400 W 7 th St. qualifies for local designation under the following highlighted criteria found in Ordinance 95-20 of the Municipal Code (1) a // (2) b, g 

1) Historic:
a) Has significant character, interest, or value as part of the development, heritage, or cultural characteristics of the city, state, or nation; or is associated with a person who played a significant role in local, state, or national history; or
b) Is the site of an historic event; or
c) Exemplifies the cultural, political, economic, social, or historic heritage of the community.
2) Architectural:
a) Embodies distinguishing characteristics of an architectural or engineering type; or
b) Is the work of a designer whose individual work has significantly influenced the development of the community; or
c) Is the work of a designer of such prominence that such work gains its value from the designer's reputation; or
d) Contains elements of design, detail, materials, or craftsmanship which represent a significant innovation; or
e) Contains any architectural style, detail, or other element in danger of being lost; or
f) Owing to its unique location or physical characteristics, represents an established and familiar visual feature of the city; or
g) Exemplifies the built environment in an era of history characterized by a distinctive architectural style

## Case Background

The proposed district consists of two buildings and a smokestack on the lot legally recorded as 013-23790-00 ORIG PLAT 293-296, PT 297 \& 298, \&; VAC STS \& ALLEY; (1.132A) Johnson's Creamery (referred to as the Creamery) is located in the heart of Bloomington's historic urban industrial center. The lot is currently zoned as Mixed-Use Downtown (MD-CD) and like other formerly industrial buildings in the area, it is currently used for office space. Just a few blocks north west of the city's courthouse square, the Creamery was nestled amongst historically significant industrial and religious buildings in the area.

Johnson's Creamery was built in 1914 by brothers Ellis W and Ward W Johnson in order to supply dairy products to Bloomington. Ellis and Ward were born in 1886 and 1888 respectively to a farming family in Orange County, Indiana. They moved to Bloomington around 1911 or 1912 and opened Bloomington Creamery Co. on 407 S Washington St where they sold ice cream and butter (Sanborn Map 1913).


Figure 1: 1913 Sanborn map with the original location of the Johnson brother's creamery "Bloomington Creamery Co.

Their business quickly outgrew the factory space and they relocated to the current location at 400 W 7th St. and renamed their company to Johnson's Creamery. The Creamery sourced their primary materials, principally milk to produce dairy products from local farmers within Monroe County. In 1935 they were touted as being the fourth largest industry in Bloomington after stone masonry, furniture making, and Indiana University (Bloomington Evening World 1935).

The Johnson brothers quickly began adapting the Creamery's offerings to the quickly changing technology of the twentieth century, in foodways, construction technologies, and the agricultural landscape of the United States. The Creamery began to expand their offering, providing both retail and wholesale dairy products as well as ice for iceboxes. Up until 1938, most of the items were delivered directly to homes using a horse and cart system. At that time they switched to motorized vehicles but continued
delivering directly to their clients until the 1960's. By 1925 the Creamery was bottling and selling pasteurized milk, "Shady Brook" Butter, Johnson's Ice Cream and ice from distilled water for ice boxes. The Creamery had grown four times in size in order to accommodate additional storage, the engine room, milk, and a butter annex. Most of the clientele was local but they exported to cities such as Pittsburgh and New York (Johnson Creamery Company 1925).

Johnson's Creamery continued to produce dairy products until 1987 when they closed for good due to the changes in food production and distribution throughout the United States. Milk and other agricultural products could be pasteurized and processed much farther from their point of origin and multi-state supermarket chains were bringing in their own milk and dairy products into the market, often for lower prices. The building remained empty until 1994 when the then owner, Joe Harrell of Harrell Mechanical, Inc., formed the Eighth Street Development Corporation and worked with architects and historic preservationists to rehabilitate the building for adaptive reuse as office space (Campbell 1995).

Many of the windows on the western and southern facades have been replaced. A concrete block structure added in 1951 was demolished during the rehabilitation in the 1990s in order to provide parking space. The exterior of the structure reflects other changes throughout its history.

## Historic surveys rating and designations:

The Creamery, on its own and within the context of the surrounding buildings have been recognized for their historical significance on multiple levels.

The Creamery has been rated as Notable in the 2018 Bloomington Historical Building Survey and was included in the National Register of Historic Places (NRHP) in March of 1996 after an extensive rehabilitation project begun in 1994. The State Historic Architectural and Archaeological Research Database and Structures Map (SHAARD) maintained by Indiana's Division of Historic Preservation and Archaeology recommends "that this property be considered significant locally", as the NRHP does not offer direct protection against severe alterations or demolition. In addition, the Creamery is located within the West Side Historic District incorporated into the NRHP in 1997.

Bethel African Methodist Episcopal Church (AME), the Showers Brothers Furniture Factory, the Wholesale Food Warehouse, and the Illinois Central Railroad Depot are some of the historically and architecturally significant buildings around the Creamery. Bethel AME Church is located west of the Creamery on 7th street just across the alley. The church is rated as Outstanding and represents a significant landmark in Bloomington's African American history. The Showers Brothers Furniture Factory,
located to the east of the Creamery is rated as Notable and is a locally designated historic district. The Illinois Central Railroad Depot on the corner of Morton St. and 7th St. is rated Notable and is both a locally designated historic district and included in the NRHP.

Historic, 1 (c): Exemplifies the cultural, political, economic, social, or historic heritage of the community.

The history of Johnson's Creamery reflects the technological advancements related to food production, distribution, and consumption, not just in Bloomington, but in most of the United States during the twentieth century. The rise and downfall of the Creamery was directly related to quickly changing technologies that allowed for hygienic and sterile food production but also in changing tastes and changes in people's relationship to food.


Figure 2: Undated, Johnson's Creamery horse and cart delivery system (Courtesy of the Monroe County History Center).

Before electricity became widely and steadily available at the turn of the twentieth century, preparing ice cream was a labor intensive treat available to those who could store ice throughout the year. During the first few decades of the Creamery's operation, they incorporated the technologies for pasteurizing milk and distilling water at industrial levels, reflecting changing norms in health and hygiene. Ice production in particular was a substantial component of their offering during the early twentieth century in order to supply domestic ice boxes before the
advent of electricity powered refrigeration. An expansion to the Creamery was built in 1927 precisely to meet these needs as the Creamery used distilled water to prepare the year's supplies of ice in winter. The low temperatures simplified the endeavor and lowered the cost and energy use later on. When people stopped requiring the 25,50 or 100 lbs of ice for food storage, the Creamery stopped mass production of ice and shifted their spatial usage (Johnson Creamery 1925).

Other products such as milk, butter, and ice cream remained staples throughout most of the 75 years of operations, although these too reflected changing technologies and health concerns. Pasteurization was incorporated in the first years of operation. Milk was delivered to individual households. Horse carts were used until 1939 but trucks continued delivering until the early 1960s. Two percent milk was introduced at a time when concerns on the fat content became prevalent throughout the United States. Ice cream came in up to twenty flavors, many of them seasonably dependent on local fruits (Creek 1986). All of the raw materials, including milk, eggs, and fruits were sourced from local farmers within Monroe County. The Creamery hired up to 100 employees at its peak in the 1950s and was considered a stable job provider (Brubaker 1996, 5).


Figure 3: Circa 1939, year when horse driven carts were being phased out in favor of motorized vehicles. The names of the drivers are hand written on this image (Courtesy of the Monroe County History Center).

The technological advancements that saw the rise of the Creamery later caused its downfall and eventual closure. Milk, like other agricultural products, was being transported from farther away,
to be processed at larger plants more efficiently. Likewise, supermarkets were providing their own products from larger interstate regions. Johnson's Creamery, like many local dairy plants, could not compete pricewise with these larger companies and consolidated with Maplehurst, a larger dairy company based in Indianapolis in 1987.

During its time serving Bloomington and the surrounding region, the Johnson's Creamery was an active participant in community events, sponsoring teams and supplying treats for special events. Mary Carol Johnson, Ellis Johnson's granddaughter provided the following memory in a letter to Bloomington's Common Council in 1990:
"The creamery also provided dairy services and great joy to Indiana University. I remember when my pop, Charlie Johnson, would stay late to make up a stencil of one of the I.U. fraternity logos, for a special function, and then imprint it on a little brick of vanilla ice cream with different colored ice cream. I also remember going down to the creamery to visit pop when he was working late and hopping into the deep freeze to look at all the different ice cream figurines for special occasions. There was the vanilla and chocolate Thanksgiving turkey and then there was the strawberry and vanilla Santa Claus for Christmas (Johnson 1990)."

The Creamery continues to reflect the history of most of Bloomington's urban industrial buildings through its adaptive reuse as office space. The Creamery continues to provide a visual memory of Bloomington's food history.

Architectural Significance, 2 (f): Owing to its unique location or physical characteristics, represents an established and familiar visual feature of the city.

Johnson's Creamery, with its combination of additions, provides visual markers of the rapid industrial changes with regards to food production throughout the twentieth century. The smokestack is the most visually stunning representation of this industrial history. Erected in 1949, the smokestack measuring 140 feet tall was the second, and smaller replacement for a previous smokestack that measured over 200 feet in height.


Figure 4: 1949 aerial photo showing both smokestacks

The smokestack potentially measured up to 178 feet in height when it was first built. Curved red brick was used along with white glazed brick to spell the word Johnson's in a serif font vertically. The smokestack is one of the tallest structures in Bloomington's urban center and can be seen from far away.

The smokestack has gone through multiple restoration and maintenance procedures particularly in the 1990's when the entire building was restored for adaptive reuse. 38 metal bands have been placed around it over time to fortify and provide stability. A study prepared by Arsee Engineers Inc commissioned by the current owners, Peerless Development, Inc. recommends partial demolition and stabilization due to continual deterioration. See Attachment 1.

The main structure not only adapted to the changing programmatic industrial needs over time, but hugs the former CSX railroad tracks now functioning as the B-Line trail. Both the main structure and the smokestack are enjoyed daily by users of the trail as well as visitors to the City's farmers market.

Architectural Significance, 2 (g): Exemplifies the built environment in an era of history characterized by a distinctive architectural style.

The construction era of Johnson's Creamery represents multiple technological advancement in building technology between 1914 and 1951. Although the exterior of the main structure and the smokestack are made of red brick, their supporting structure, architectural styles, and reason for
being reflect the changing technological needs within the factory, as well as the changing structural techniques of the time. The original portion built in 1913 was "framed within its brick walls with timber posts, beams, joist work, and floors (Campbell 1995)." The 1921 and the 1927 three story Art Deco ice house additions incorporated steel columns and concrete floors in the interior. The 1951 office addition was built out of block with red brick facing and aluminum windows (Campbell 1995).

The additions to the original building offer a visual marker of important historical moments within the development of the Creamery's changing technology and usage.

## Recommendation: Approval

Staff recommends property parcel 013-23790-00 ORIG PLAT 293-296, PT 297 \& 298, \&; VAC STS \& ALLEY; (1.132A) Johnson's Creamery be designated as a local historic district. After careful consideration of the application and review of the Historic District Criteria as found in Ordinance 95-20 of the Municipal Code, staff finds that the property not only meets, but exceeds the minimum criteria listed in the code.

The property meets Criteria 1(c) because of its historical impact on Bloomington's food, agricultural, and social history through the production and sale of dairy products.

The property meets Criteria 2(f) because of the unique form of the building located by the historic CMX railroad tracks, the industrial form of the building, and the visibility of the smokestack with the word Johnson's emblazoned on it.

The property meets Criteria 2 (g) because the form, materials, and architectural features are representative of the changing technologies in construction as well as the changing programmatic uses of the building throughout over the course of various decades.

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## Attachment 1

# Arsee Engineers, Inc. CLIENT ORIENTED - BY DESIGN 

Johnson Creamery Smokestack for<br>Joseph Patrick<br>Peerless Development<br>105 S. York Street, Suite 450<br>Elmhurst, IL 60126

March 1, 2022
Joseph Patrick
Director of Development
Peerless Development
105 S. York Street, Suite 450
Elmhurst, IL 60126
Re: Johnson Creamery Smokestack
Bloomington, Indiana
Mr. Patrick:

## EXECUTIVE SUMMARY

We have completed our reassessment of the Johnson Creamery Smokestack in Bloomington, Indiana. This work has included a review of findings by others since our original assessment was performed in 2017. We have revisited the site and made comparisons to our earlier work to see how the deterioration is progressing. Using wall profiles determined by others in 2020, we have refined our structural analysis of the stability of the stack in design wind and seismic events as required by the current Building Code. Multiple options for repair have been considered.

Deterioration has progressed. New spalls are visible in at least 11 locations. One of the 38 steel straps observed in 2017 has either been removed or has fallen. Previous comments by ourselves in 2017 and others in 2020 regarding how much the stack leans were rough estimates based on visual observations. 3D point cloud analysis in 2022 reveals the stack is leaning $2^{\prime}-3 \frac{1}{2} /{ }^{\prime \prime}$ to the southeast.

Work by R \& P in 2020 determined wall thicknesses and profiles throughout the height of the stack. This allowed us to refine our structural analysis and more accurately evaluate the stability of the stack with regard to the current Building Code. Our analysis has shown that even a new masonry stack built to the same height, configuration, wall thicknesses and profiles will fail in a design wind or seismic event. In its current configuration, the unreinforced brick masonry stack will have to be reduced in height to $60^{\prime}$ to meet current Code requirements. Conceptually, the stack could be reduced to the height of $75^{\prime}$ and meet the current Code by reinforcing the interior of the stack with concrete and enlarging and supplementing the existing foundation. Changes in the Building Code since the stack was constructed in 1949 simply make an unreinforced masonry stack of this height and wall construction impossible.

Our detailed observations and comments follow.

## BACKGROUND OF THE STUDY

Arsee Engineers first assessed the smokestack in the fall of 2017 as part of a due diligence assessment for the City of Bloomington. Our report summarizing this work is attached as Appendix A and is hereby included into this report by reference.

The purpose of the current study has been to reassess the condition of the stack and offer recommendations on its stability and potential repair. In order to facilitate this effort, we have performed the following

- We have reviewed work performed by others since 2017.
- Report prepared by R and P Industrial Chimney Company, Inc. (R \& P) dated April 6, 2020.
- Report prepared by Patriot Engineering dated January 7, 2021.
- Proposals prepared by the Gerard Chimney Company for various repair options in 2021.
- We have revisited the site and performed the following:
- Videotaped and took still photographs with a remote controlled aerial drone.
- Created a 3D point cloud of the stack from videos taken by the drone.
- Taken elevations of the exposed corners of the concrete foundation.
- Developed montages of the stack for comparison with 2017 observations.
- We have updated our structural analysis of the stack using wall thicknesses and profiles reported by R \& P in their 2020 report.


## OBSERVATIONS

## The Leaning of the Smokestack

The smokestack leans or tilts to the southeast. This is severe enough that it can be seen from ground level with the naked eye as shown in Photos 1 and 2. In 2017 we determined that the top of the stack was leaning 1 foot in every 10 and estimated that the overall tilt was in the order of several feet.

In their 2020 report, R \& P estimated the chimney was leaning nearly 18 inches out of plumb. They further stated the curvature appeared to start at the 70 foot level but minor displacements were also observed below.

In the current study, we attempted to determine the lean or tilt of the stack in two ways. First we used a surveying transit to create a vertical "line" through the center of the stack in a direction approximately perpendicular to the lean. This is depicted photographically in Figure 1. This eliminates any potential parallax effect from the photograph. Comparing the proportions of the difference from the centerline to the width of the stack, we estimate the stack is 1 ' -9 " out of plumb
from this vantage point. Figure 2 shows an image from our report in 2017 for comparison. This was created without the aide of a transit. A second method to determine the distortion used a remote controlled aerial drone to create a 3D point cloud of the stack. From this "measurements" can be made showing how far it is out of plumb. Figures 3 though 11A show pairs of aerial photographs and the 3D point cloud at various positions around the stack. The maximum distortion was found to be $2^{\prime}-3^{1} / 2^{\prime}$ where the stack leans to the southeast. The stack appears to start to curve or lean to the southeast just above the 25 foot level. If the stack were to fall in the direction of the lean, much like a tree being cut down, it would fall as shown in Figure 12. The overall radius of $140^{\prime}$ from the center of the stack is also shown to get a sense of the danger zone.

## Foundation of the Smokestack

The report prepared by Patriot Engineering investigated the foundation of the stack. Their report concluded that the concrete foundation is resting on bedrock and that bedrock is approximately 8.5 to 10.5 feet below grade level. They did not attempt to drill down into the rock to look for mud or clay seams.

Using a surveying level, elevations were taken at each of the eight corners of the octagonally shaped foundation. While one would not expect a foundation like this to be perfectly level there is a definite trend showing the foundation tilts to the southeast. See Figure 13. A 1 inch tilt in the 14 foot wide foundation corresponds to a 10 inch tilt out of vertical in the 140 foot tall stack. The apparent displacement of the concrete could be result of compression of a mud or clay seam in the bedrock in the southeast portion of the foundation causing it to "tilt" in that direction.

## Visual Assessment Comparison

The drone was also utilized to create a series of vertical montages of the stack from different angles. The orientation of the montages attempted to copy a similar set of montages taken in 2017 so that the two sets could be compared. See Figures 14 through 16. In 2017 we observed 38 steel bands in the stack. The 2022 montages show band $\# 35$ down from the top is now missing. $\mathrm{R} \& \mathrm{P}$ reported only 37 steel bands when they performed their assessment in 2020 and noted there was evidence of one missing. Photos 3 and 4 show this location in 2017 and 2022. Rust stains and a bead of sealant are visible in the 2022 photo where the band was located.

Evidence of spalling was also compared between the 2017 and 2022 montages. There are 11 locations in 2022 where new spalling is visible. These generally occur in the south to southwest face of the stack between 60 and 100 foot levels. Examples are shown in Photos 5 and 6. Face shell spalling was also more evident at the foundation as shown in Photos 7 and 8.

## STRUCTRUAL ANALYSIS

Using information reported by R \& P from their investigation of the interior of the stack we were able to refine our previous structural analysis. In 2017 we assumed wall thicknesses based on previous experience with similar stacks. R \& P cut a hole in the steel plate roof and lowered a camera to observe the condition of the masonry and determine a more accurate wall profile. Using the $\mathrm{R} \& \mathrm{P}$ wall profile we have re-evaluated the stability of the stack under current code
requirements for wind and seismic loads. Further assumptions used in the analysis are presented in Appendix B. Our findings can be summarized as follows

- The smokestack will go into tension at the base under the current Code required wind load.
- The smokestack will go into tension at the base under the current Code required seismic load.
- The stack would have to be shortened to the $100^{\prime}$ level to eliminate tension at the base due to the current Code required wind load.
- The stack would have to be shortened to the $60^{\prime}$ level to eliminate tension at the base due to the current Code required seismic load.

In other words, even in its original configuration (ie: undistorted) the stack does not meet the requirements of the current Building Code for either wind or seismic loads. A design wind ( 120 mph gust for a period of 3 seconds) or a design seismic event would theoretically cause severe damage up to and including potential collapse of the stack.

## REPAIR OPTIONS

At the onset of this study three options were to be investigated as follows:
Option 1- Removal of the stack down to the 70 foot level and repair the remaining masonry down to grade.
Option 2-Same as Option 1, but also reconstructing the stack to a height of 100 feet.
Option 3- Same as Option 1 but reconstructing the stack to a height of 140 feet.
Given the results of the latest structural analysis - none of these options will meet current Code requirements and therefore are not feasible. Given the configuration of the masonry walls of the stack any option over 60 feet in height will not meet the requirements of the Building Code for seismic loads.

In light of all this, we believe there are two viable options at this point.

## Option A

- Remove the entire structure down to the 60 ' above grade level. Salvage face shells from sound brick for spall repair below this level. Dispose of steel plate roof/beams and straps above 60' level.
- Remove the inner brick liner and all debris in the bottom of the stack.
- Inspect the remaining steel straps and repair as necessary.
- Remove spalled and/or cracked brick and patching material from previous spall repairs. Replace the entire face shell with brick salvaged from above. Assume a total of 250 of these will be repaired.
- Epoxy inject approximately 250 LF of cracks.
- Properly cut out and tuckpoint all of the remaining mortar joints.
- Install a new concrete roof system with venting.

Option A is the tallest configuration available to have the stack meet all current Building Code requirements without having to reinforce the base for seismic loads. By removing the upper 80 feet of the stack and reducing the load on the foundation we do not believe supplemental modifications to the foundation will be necessary.

## Option B

- Remove the entire structure down to the $75^{\prime}$ above grade level. Salvage face shells from sound brick for spall repair below this level. Dispose of steel plate roof/beams and straps above the $75^{\prime}$ level.
- Inspect the remaining steel straps and repair as necessary.
- Remove spalled and/or cracked brick and patching material from previous spall repairs. Replace the entire face shell with brick salvaged from above. Assume a total of 300 of these will be repaired.
- Epoxy inject approximately 300LF of cracks.
- Properly cut out and tuckpoint all of the remaining mortar joints.
- Install a new concrete roof system with venting.
- Remove the inner brick liner and all debris in the bottom of the stack to expose the concrete foundation.
- Install a series of 1 inch diameter vertical reinforcing bars at 12 inches on center in a circle inside the stack. These will be epoxied into holes drilled into the top of the concrete foundation. Install a series of $1 / 2$ inch diameter stainless steel all thread rods into the masonry walls on the inside face of the stack (approximately 300 rods) set in epoxy.
- Fill the bottom of the stack with concrete to a depth of approximately 20 feet. This would be performed in multiple pours so that the hydrostatic pressure of the wet concrete does not blow out or distort the walls of the stack.
- Excavate around the perimeter of the foundation down to bedrock. Install reinforcing bars into the sides of the foundation and pour a reinforced concrete "doughnut" to create a larger more stable foundation.

Option B is the tallest configuration available assuming the brick from the original stack can be kept in place and (with significant unseen modifications) the refurbished stack can meet current Building Code requirements for wind and seismic loads.

Working with Gerard Chimney and Glenroy Construction (a local General Contractor) the following budgetary cost estimates have been developed. These are anticipated construction costs and do not include $\mathrm{A} / \mathrm{E}$ fees, contingencies or other soft costs.

> Option A - Remove stack down to 60 ' level Budgetary cost estimate

Option B— Remove stack to down 75' level/reinforce
Interior and modify foundation
Budgetary cost estimate
\$ 525,000

A key element in either option is the length of time it would take to demo the upper part of the smokestack down to the $75^{\prime}$ or $60^{\prime}$ so that the Farmer's Market could open in the nearby parking lot. Gerard Chimney believes this could be accomplished in approximately 4 weeks from the receipt of a Notice to Proceed.

## TEMPORARY STABILIZATION

During the course of this work, the question has been raised as to whether the smokestack could be temporarily stabilized in place until more permanent repairs are undertaken.

Theoretically - the answer is yes.
We have investigated two schemes to "hold" the smokestack in place with a supplemental steel frame of some type.

1. Construction of pipe scaffolding that would completely encircle the stack. The scaffold would have to tie into the walls of the tower near mid height to use the self weight of the masonry to keep windward side of the scaffold from lifting off the ground in a lateral wind or seismic event.
2. A steel frame made of wide flange beams and columns that would encircle the stack. This frame would be bolted to new concrete foundations to hold the steel frame down in a wind or seismic event.

Huge challenges for either of these schemes involve the proximity of the two buildings to the east and southeast of the stack. The pipe scaffolding or steel frame would have to extend onto/into both of these structures. No attempt has been made to determine how this would be performed. Nothing is insurmountable - but either of these temporary stabilization schemes seems very impractical.

With the aide of Specialty Contractors for scaffolding and steel erection very rough cost estimates have been developed for these two schemes.
$\begin{array}{ll}\text { Pipe scaffolding (2 month rental) } & \$ 350,000 \\ \text { Steel Framing } & \$ 550,000\end{array}$
These do not include $\mathrm{A} / \mathrm{E}$ fees, contingencies or other soft costs. The pipe scaffolding would take approximately 7 weeks to design and install assuming Scaffold King could be contracted directly and assist us in the design to expedite the overall process. The steel frame would take on the order of 10 weeks to order, fabricate and install if the work did not have to be publicly bid.

## CONCLUSION

In our opinion, this re-evaluation of the smokestack has helped us develop a better understanding of 1) how it is constructed, 2) how it has deteriorated and 3) what options are truly available to stabilize and repair it.

The concept of restoring it to its original height and appearance is understandable and obviously in the historical sense, desirable. The reality is the stack was constructed when the potential for
significant seismic forces was not considered in the Building Code used in Indiana. Masonry stacks typically do not fare well in seismic events and our scientific understanding of earthquakes has heightened concern enough that there are now Code provisions for them. In order for a 140 foot tall stack to meet the Building Code in this same location today it would have to be constructed from literally the ground up with different wall profiles and with a new foundation.

Lowering the stack to a level of 60 to 75 feet in height will preserve the original material to at least some degree.

This report will probably generate further questions and discussion. We are happy to try to answer them and help move this process along.

Your truly,



Photo 1 Looking up the wall of the stack on the southeast face.


Photo 2 Looking up the wall of the stack on the opposite side as Photo 1.


Photo 3 Photo taken in 2017.


Photo 4 Photo taken in 2022. Band 35 is gone. Remnants of sealant at the top of the band are highlighted as is a new spall.


Photo 5 New spalls are highlighted in this 2022 photo.


Photo 6 More new spalls are highlighted.


Photo 7
Spalling extends to the base of the stack.

Photo 8
The face shells are splitting off from the body of the brick.

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## 184

ASSUMING THIS IS AN ANOMALY, THE TOP OF THE FOUNDATION TILTS DOWN TO THE SOUTHEAST APPROXIMATELY $1^{\prime \prime}$.


FIGURE 13





# Arsee Engineers, Inc. CLIENT ORIENTED - BY DESIGN 

Johnson Creamery Smokestack Assessment for
Alex Crowley
City of Bloomington
401 N. Morton, Suite 150
P. O. Box 100

Bloomington, IN 47404

Daniel M. Calabrese, PE
Matthew D. Kilgour, PE
Albert C. Kovacs, PE
Bryan R. Wilson, PE

Andrew P. Langferman, PE Gary D. Linard, PE Laura E. Metzger, PE Philip R. Savich, PE

November 30, 2017

Alex Crowley<br>City of Bloomington<br>401 N. Morton, Suite 150<br>P. O. Box 100<br>Bloomington, IN 47404

## Re: Johnson Creamery Smokestack

Dear Alex:

## EXECUTIVE SUMMARY

We have completed our assessment of the smokestack within the Johnson's Creamery facility. This work has included up close observation/documentation using both a crane and man basket as well as drone technology.

The current stack is approximately 140 feet tall and is reported to have been constructed in 1949 . The upper portion of the stack leans several feet to the south/southeast. Crude measurements show it is out of plumb one foot in every ten at the top of the stack. In our opinion, this movement has occurred after construction - it was not built this way.

Deterioration is visible throughout the height of the stack to various degrees but is more prominent in the upper half. This takes the form of spalled brick, cracking (predominantly vertical) and deteriorated mortar. There is evidence of numerous different repairs being made over the years. Most of these have been of a more cosmetic nature and the deterioration continues to progress. The top of the chimney is capped with a steel plate - this promotes deterioration on the inside face of the masonry. The extent of such deterioration is unknown.

A preliminary structural analysis of the stack shows it can go into tension under design wind or seismic loads required by current Building Codes and theoretically overturn. This analysis has not attempted to take into account the distorted shape of the stack or the cracking/spalling of the masonry. These conditions increase concerns over the stability of the stack.

Extensive repairs must be implemented if the stack is to remain. A ballpark estimate of $\$ 350,000$ has been developed with the aid of a contractor who has repaired similar stacks. Further analysis is required to finalize a repair program including assessment of the interior of the stack. Our detailed observations and comments follow.

November 30, 2017
Alex Crowley
City of Bloomington
Re: Johnson Creamery Smoke Stack
Page 2

## BACKGROUND OF THE ASSESSMENT

This assessment has been limited to the masonry smokestack of the Johnson's Creamery facility in Bloomington, Indiana. The current stack is approximately 140 feet tall based upon measurements taken in the field and has a total of 38 steel bands encircling it as shown in Photo 1 and Figure 1. The "Johnson's" logo is prominently visible facing to the southeast. A review of the literature reveals the oldest portion of the Johnson's Creamery facility dates back to 1913-14. Photographs from the Monroe County Historical Society from the period of 1921 to 1943 show an earlier stack which has a slightly different configuration at the top and does not have the Johnson's logo. See Figures 2 through 4. A National Register nomination in 1995 reports "The current 178 foot smokestack replaced an earlier one in 1949." This nomination is included as Appendix A.

The discrepancy in the height of the current stack is interesting. The 1995 nomination citing a height of 178 feet may simply be wrong or approximately 38 feet of the stack has been removed.

The stack is constructed of multiple wythes of unreinforced brick masonry supported by a concrete foundation of unknown depth. There was no indication of abnormal or significant differential movement or settlement of the foundation. The stack is approximately $12^{\prime}-6^{\prime \prime}$ in diameter at the base and $7^{\prime}-0 "$ at the top. Individual brick are nominally sized at $61 / 4 " \mathrm{w} \times 41 / 2 " \mathrm{~h} \times 23 / 4 \mathrm{t}$.

A visual assessment was performed on November $22^{\text {nd }}$. A 50 ton crane and man basket were used to observe and photograph the stack up close. Still and video images were recorded using a DJI Matrice 600 Pro drone. See Photos 2 through 4. Mortar samples were taken of both the original and repair mortars and are available for further analysis as the need may arise. A series of holes were drilled to a depth of two inches throughout the height of the stack to get a feel for the relative hardness of the mortar. No further testing or sampling was performed. A steel grate welded over the opening at the base of the stack prevented observation of the interior.

## OBSERVATIONS

The following observations were made either while on site or during a review of the photographs and historic images. See Photos 5 through 47 and Figures 5 through 8.

- There is evidence of numerous significant repairs being made at multiple times since 1949.
- A total of 38 steel bands are in place throughout the upper 100 feet of the stack. All are tight and in good condition. These were installed to address vertical cracking which occurs throughout the majority of the stack.
- The steel bands appear to have been installed at different times. Extensive tuckpointing was performed prior to installation of most of the steel bands. See Figure 5. Many more repairs have been made after installation.

November 30, 2017
Alex Crowley
City of Bloomington
Re: Johnson Creamery Smoke Stack
Page 3

- Cell phone equipment is installed approximately 120 feet above grade level.
- The top of the stack is covered with a steel plate. This prevents rainwater from entering to the interior but also promotes freeze/thaw deterioration on the inside face of the stack. Warm, moist air rises and condenses on the colder masonry surface. Numerous brick shards were visible on the interior of the stack at grade level.
- The walls of the stack vary in thickness from 20 inches ( 5 wythes of brick) at the base to 7 inches ( 2 wythes of brick) at the top. Transition points from 5 to 2 wythes are unknown.
- Faces of the brick have spalled in numerous locations. This seems to be more prevalent on the south, west and east sides. This appears to have been an ongoing problem for many years as there is evidence of multiple different ways repairs have been attempted.
- New deterioration continues to occur in areas where previous repairs have been made - the deterioration is progressive and is continuing.
- Loose shards of brick and mortar have, and will continue to fall from the outside of the stack. This presents a real danger to the public and cars parked nearby. Shards falling from the side of the stack would be expected to "slide" down until they strike a steel band and "bounce" outward.
- Glazed brick used to create the Johnson's logo have deteriorated in a different manner. The glaze has spalled away from the body of the piece. Multiple units have been replaced in the lower " S ". This occurred prior to installation of the steel band in this location.
- More recent repairs have been of a more cosmetic nature. Tuckpointing and brick replacement have been replaced with face caulking, cementitious patches and tuckpointing efforts where mortar is "buttered" over the eroded joint. The tuckpointing mortar is harder than the original mortar. It has debonded and fallen back out in numerous locations.
- We have performed similar assessment on six other smokestacks of similar or older vintage. The mortar in this stack is as soft as or softer than that in any of the other stacks we have investigated.
- New (unrepaired) cracks were observed. These occur throughout the height of the stack.
- The stack visibly leans to the south as shown in Figure 6 and Photos 44 through 47. Multiple reports indicate this condition has been present for a long period of time. Plumb bob measurements found the top of the stack is out of plumb at a slope of 1 to 10 or approximately $6.0^{\circ}$.
- Montage views of the upper portion of the stack are shown in Figure 7. A montage of the logo on the southeast face is shown in Figure 8.


## STRUCTURAL ANALYSIS

We have performed structural analyses of the smokestack, modeling it in a finite element software program, RISA 3D, primarily to determine the structural natural frequency. This was necessary to evaluate its ability to withstand lateral loads under current Building Codes. Our analyses assumes a perfectly plumb smokestack and does not account for cracking/spalling of the masonry.

These analyses assume the hollow core clay brick masonry is unreinforced and un-grouted and that it varies in thickness from two wythes at the top to five wythes at the base. We assumed mortar in the bed joints of the brick is placed only on the face shells of each brick.

The lateral analyses assumes a Type II construction and a 1.0 importance factor. The total horizontal seismic shear load required by Code is equal to $10 \%$ of the total weight of the stack, or 21,000 pounds located at a height of 55 feet above grade level. The lateral wind pressure on the stack varies from 34 pounds per square foot ( psf ) at the top to 13 psf at the base.

Under normal gravity loads, the compressive stresses in the brick face shells appear to be within an acceptable range. However, when either wind or seismic loads are placed on the smokestack, there is some concern for tension in the mortar joints. The magnitude of these tension stresses warrants a more detailed analysis, but can likely be resolved with vertical reinforcement in the walls at the stack base.

We also reviewed the Structural Analysis Report dated November 20, 2017, prepared by GPD Group, Inc. In general, it appears they have used rational engineering judgment. However, their assumptions of brick configuration and wall thicknesses exaggerate unit dead load of the masonry walls resulting in a computed stack weight that is more than double what our analysis shows. This is unconservative when evaluating lateral loads in the stack. Their report did not include a seismic analysis.

## CONCLUSIONS AND RECOMMENDATIONS

In light of the above and based upon our experience with several other smokestacks of similar construction, age and geographic location, we come to the following conclusions:

- The current smokestack was constructed in 1949 and is approximately 140 feet tall. The National Register nomination listing it at 178 feet in height was either grossly in error or some 38 feet have been removed. If the top of the stack was removed within the last 25 years it would have been a monumental event which many people would remember and one that should be recorded by newspapers, etc. We have not found any such documentation.

November 30, 2017
Alex Crowley
City of Bloomington
Re: Johnson Creamery Smoke Stack
Page 5

- The upper portion of the stack leans visibly to the south/southeast. Crude measurements find the masonry above the cell phone equipment to be out one foot horizontally for every ten feet vertically. The top of the stack is visibly displaced several feet from where it would be if it were constructed normally and plumb. Reports by people that it has been this way for many years may be true but it is incomprehensible that it was constructed in this distorted shape.
- There is evidence of numerous repair efforts being made over the years to address brick spalling, cracking and mortar deterioration. The majority of these repairs have been more cosmetic than permanent solutions. Deterioration continues to progress - new cracks develop, more brick faces fall, existing cracks re-open and repair mortar debonds and falls out.
- Covering the top of the stack with a steel cap promotes deterioration on the interior. The extent of this deterioration is unknown.
- The original mortar is as soft as or softer than any other stack we have assessed. Mortar samples were taken and can be tested to determine composition and anticipated strength if necessary.
- Still photographs and videos were taken in vertical "drops" around the circumference of the stack. Detailed repair drawings could be generated from these but are beyond the scope of this assessment.
- In our opinion, there is no question extensive repairs are necessary if the stack is to remain. To get a sense of the order of magnitude of what these might cost, we solicited the help of a local masonry contractor who has worked on similar stacks and asked him to price the following:
- Install six vertical steel straps welding them to the 38 circumferential bands to provide resistance to lateral loads and further leaning of the masonry. These would extend from the top of the stack down to and be attached to the concrete foundation.
- Properly cut out and tuckpoint all of the mortar joints.
- Remove and replace approximately 200 brick which have spalled or have been patched.
- Epoxy inject 1,000 LF of cracks.
- A ballpark estimate of the cost of these repairs is $\$ 350,000$. This does not include $\mathrm{A} / \mathrm{E}$ or CM fees, contingencies or other indirect expenses. It would require the cell phone equipment be turned off while work is being performed in close proximity.

November 30, 2017
Alex Crowley
City of Bloomington
Re: Johnson Creamery Smoke Stack
Page 6

- Before such a repair program is finalized, we recommend these additional steps be undertaken:

1. Analyze the composition of the original mortar.
2. Remove and test prisms of brick and mortar to more accurately determine the physical characteristics of the brick and mortar assemblage.
3. Perform some sort of assessment of the interior of the stack.
4. Import the video taken from the drone and generate a 3-D computer model of the stack in its current condition. From this, accurate measurements of the distortion can be made and a more rigorous structural analysis can be performed.

We suspect this report will promote significant discussion regarding the condition and future of the smokestack. We will be happy to meet and discuss our observations in person if you like.

Yours truly,


Frederick A. Herget Professional Engineer

/kna


Gary D. Linard
Professional Engineer


Photo 1
Overall view from the southeast.

Photo 2
Close up observations were made from a crane and basket.


## Photo 3

Video and still images were recorded with a drone.


Photo 4
Close up of the drone.


Photo 6
...and several bands have been installed at the top. The "larger" white mortar joints have been tuckpointed.

Photo 5
Historic photo (unknown year). It appears repairs are being made throughout the height of the stack. Bands 33 through 37 are visible...



Photo 8
These were installed to address vertical cracking which occurs throughout the upper 100 feet of the stack.

Photo 7
A total of 38 steel bands are currently in place on the stack.


## Photo 9

Closer view of bands and cell phone equipment in the upper portion of the stack.


Photo 10
The $1 / 4 \times 4$ inch steel bands are secured with two, $3 / 4$ inch diameter bolts.


Photo 11 The top of the stack has been capped with a steel plate.


Photo 12 This prevents rain from falling inside but promotes freeze/thaw deterioration due to the "chimney effect" where warm, moist air rises and condenses on the inside face of the masonry.


Photo 13 Opening at the base of the stack.


Photo 14 Wall thickness at the opening is 13 inches or 3 wythes of brick. This flares out to 5 wythes of brick or 20 inches in thickness on the sides of the opening.


Photo 16
Splitting cracks running parallel to the face of the brick are visible adjacent to the "hole."



Photo 17 Interior face of a shard found on the ground.


Photo 18 The outer face shell is only $3 / 4$ inches thick.

## Photo 19

Multiple forms and vintages of deterioration are present:
$\mathrm{A}=$ Recent spalling
$\mathrm{B}=$ Vertical cracking
$\mathrm{C}=$ Spalled areas where brick were replaced with brick
$\mathrm{D}=$ Spalled areas where brick were replaced with patching compound


Photo 20
Closer view of these conditions.


Photo 22
Such shards and spalls occur adjacent to longer vertical and/or stair step cracks.

Photo 21
Loose shards of brick up higher in the stack.



Photo 23 Cementitious patches have been used to replace spalled brick in numerous locations.


Photo 24 The patching material cracks and falls away itself.


Photo 26
More multiple repair efforts.
A=Brick were patched
$\mathrm{B}=$ Tuckpointing
$\mathrm{C}=$ Face caulking

Photo 25
Area where multiple repairs have been made (probably at different times).
$\mathrm{A}=$ Brick were replaced with brick $\mathrm{B}=$ Brick were patched $\mathrm{C}=$ Eroded joints were tuckpointed


## Photo 27

Several of the glazed tile in the " $S$ " were replaced.


Photo 28
This occurred prior to the steel band being placed in this location.


Photo 29 Glaze spalls continue to occur.


Photo 30 Similar condition in another location.



Historic photo showing bands 33 through 37 as seen


Three vintages of crack repair: A \& B - different colors of tuckpointing mortar and C - face caulk.

## Photo 34

Yet another way of addressing cracks in the masonry.



Photo 36
Face caulk with a different color of material.

Photo 35
Face caulking over cracks.


## Photo 37

Unrepaired cracks lower in the stack...


Photo 38
... and near the top of the stack.

## Photo 39

Tuckpointing mortar falls back out of the joints in multiple locations.


Photo 40
Closer view of one such area.


Similar condition in another location.

Photo 42
This repair mortar was painted over.



Photo 43A
Harder tuckpointing mortar is removed to reveal softer cracked/eroding original mortar.

## Photo 43B

Similar condition in another location.


Photo 43C
The original mortar is much softer than the tuckpointing material when drilled.


Photo 45
...demonstrating how much the stack leans.

Photo 44
The crane wire serves as a giant plumb bob...



Measurements taken above the cell phone equipment revealed the top of the stack leans 10 inches in 90 inches.

Photo 47
This was taken on the north side of the stack.



Johnson Creamery - undated (post 1921) Monroe County Historical Society





FIGURE 7


## United States Department of the Interior National Park Service

## National Register of Historic Places

Registration Form

This form is for use in nominating or requesting determinations for individual properties and districts. See instructions in How to Complete the National Register of Historic Places Registration Form (National Register Bulletin 16A). Complete each item by marking "x" in the appropriate box or by entering the information requested. If an item does not apply to the property being documented, enter "N/A" for "not applicable." For functions, architectural classification, materials, and areas of significance, enter only categories and subcategories from the instructions. Place additional entries and narrative items on continuation sheets (NPS Form 10-900a). Use a typewriter, word processor, or computer, to complete all items.

## 1. Name of Property

## historic name Johnson's Creamery

## other names/site number N/A

2. Location


## 3. State/Federal Agency Certification

As the designated authority under the National Historic Preservation Act, as amended, I hereby certify that this nomination $\square$. request for determination of eligibility meets the documentation standards for registering properties in the National Register of Historic Places and meets the procedural and professional requirements set forth in 36CFR Part 60. In my opinion, the property区meets does no meet the National Register criteria. I recommend that this property be considered significant nationally statewide logally. ( S See continuation sheet for additional comments.)

## Signature of certifying official/Title



Indiana Department of Natural Resources
State or Federal agency and bureau
In my opinion, the property $\square$ meets $\square$ does not meet the National Register criteria. ( $\square$ See continuation sheet for additional comments.)

## Signature of certifying official/Title Date

State or Federal agency and bureau

## 4. National Park Service Certification

I hereby certify that the property is:
E entered in the National Register.
I- See continuation sheet.determined eligible for the National Register

- See continuation sheet.determined not eligible for the
National Registerremoved from the National Registerother, (explain:) $\qquad$

| Name of Property | County and State |
| :---: | :---: |
| 5. Classification |  |
| Ownership of Property(Check as many boxes as apply) $\quad$Category of Property <br> (Check only one box) | Number of Resources within Property (Do not include previously listed resources in the count |
| $\triangle$ private $\quad$ b building | Contributing Noncontributing |
| public-local $\quad$ district | 10 buildings |
| $\square$ public-Federal $\square$ structure | 0 0 sites |
| object | 0 0 structures |
|  | 0 0 objects |
|  | $1 \begin{array}{lll}1 & 0 & \text { Total }\end{array}$ |
| Name of related multiple property listing <br> (Enter "N/A" if property is not part of a multiple property listing.) | Number of contributing resources previously listed in the National Register |
| N/A | 0 |
| 6. Function or Use |  |
| Historic Functions <br> (Enter categories from instructions) | Current Functions <br> (Enter categories from instructions |
| Industry: Manufacturing Facility | Business |
|  |  |
|  |  |
|  |  |
|  |  |
|  |  |
| 7. Description |  |
| Architectural Classification (Enter categories from instructions) | Materials (Enter categories from instructions) |
| No Style | CONCRETE |
|  | walls BRICK |
|  | STONE: Limestone |
|  | roof SYNTHETICS: Vinyl |
|  |  |

[^1]
## Applicable National Register Criteria <br> (Mark " $x$ " in one or more boxes for the criteria qualifying the property for National Register listing.)

A Property is associated with events that have made a significant contriibution to the broad patterns of our history.
$\square \mathrm{B}$
Property is associated with the lives of persons significant in our past.

【 C Property 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 lack individual distinction.
$\square$ D Property has yielded, or is likely to yield, information important in prehistory or history.

## Criteria Considerations

(Mark " $x$ " in all the boxes that apply.)

## Property is:

$\square$ A owned by a religious institution or used for religious purposes.B removed from its original location.a birthplace or grave.D a cemetery.
$\square$ E a reconstructed building, object, or structure.
$\square$ F a commemorative property.less than 50 years of age or achieved significance within the past 50 years.

## Areas of Significance

(Enter categories from instructions)
ARCHITECTURE
INDUSTRY
$\qquad$
$\qquad$
$\qquad$
$\qquad$
$\qquad$

## Period of Significance

1914-1951

## Significant Dates

1914
1921
1927

## Significant Person

(Complete if Criterion B is marked above)
N/A
Cultural Affiliation
N/A

## Architect/Builder

Unknown

Narrative Statement of Significance
(Explain the significance of the property on one or more continuation sheets.)

[^2]
## 10. Geographical Data

Acreage of Property less than one acre $\qquad$

## UTM References

(Place additional UTM references on a continuation sheet.)


Verbal Boundary Description
(Describe the boundaries of the property on a continuation sheet.)

## Boundary Justification

(Explain why the boundaries were selected on a continuation sheet.)

## 11. Form Prepared By

> name/title Cynthia Brubaker
organization Preservation Development, Inc._ date 06/15/95
street \& number 400 West 7 th Street, Suite 110 telephone (812) 336-2065 city or town Bloomington state Indiana_ zip code 47404

## Additional Documentation

Submit the following items with the completed form:

## Continuation Sheets

Maps
A USGS map ( 7.5 or 15 minute series) indicating the property's location.
A Sketch map for historic districts and properties having large acreage or numerous resources.

## Photographs

Representative black and white photographs of the property.

## Additional items

(Check with the SHPO or FPO for any additional items)

## Property Owner

(Complete this item at the request of SHPO or FPO.)
name fth St. Development Corp.
street \& number $\quad 400$ West 7th Street, P.O. Box 221 telephone (812) 335-2058
city or town Bloomington
state Indiana
zip code 47404
Paperwork Reduction Act Statement: This information is being collected for applications to the National Register of Historic Places to nominate properties for listing or determine eligibility for listing, to list properties and to amend existing listings. Response to this request is required to obtain a benefit in accordance with the National Historic Preservation Act, as amended (16 U.S.C. 470 et seq.).

Estimated Burden Statement: Public reporting burden for this form is estimated to average 18.1 hours per response including time for reviewing instructions, gathering and maintaining data, and completing and reviewing the form. Direct comments regarding this burden estimate or any aspect of this form to the Chief, Administrative Services Division, National Park Service, P.O. Box 37127, Washington, DC 20013-7127; and the Office of Management and Budget, Paperwork Reductions Projects (1024-0018), Washington, DC 20503.

## United States Department of the Interior National Park Service

## National Register of Historic Places Continuation Sheet

Section number 7 Page 1 Johnson's Creamery, Bloomington, Monroe Co., IN


#### Abstract

Johnson's Creamery is a rambling conglomeration of added components that form a unique complex with a functional architectural style. The 35,000 square foot complex is surrounded by other former industrial and commercial buildings, raiiroad tracks, surface parking lots and a church. Its larger context is the historic industrial corridor of Bloomington's near west side, which forms the eastern section of the proposed West Side National Register Historic District.

The original Johnson's Creamery building, built in late 1913 or 1914, was a two-story red brick building, rectangular in plan, at the southeast part of the current structure. The original building opens onto a loading dock at the southeast corner facing the railroad tracks and has a parapeted asphalt roof with a shallow slope towards the rear. The limestone capped parapet steps down as the roof slopes to the rear. Subsequent additions were added over the years up to 1951 that were all built of red brick masonry walls and parapeted, low-pitch asphalt roofs. No part of the Creamery was present on the August 1913 Sanborn insurance map. The 1927 Sanborn insurance map, a 1949 aerial photograph, former owners and employees and physical evidence provided guidance in dating the components.


A small two-story component, identified by its first floor interior vaulted ceiling and angled exterior that conforms to the railroad tracks, was probably added to the original building early. A painted sign and intilled window openings on interior masonry walls on the east and north sides of the building contirm that they were once exterior walls. A boiler and coal room, probably built as a separate structure at or near the time of the original building, was later linked to the original building with the construction of a mechanical, engine and tank storage room. The boiler room is two stories high with a single interior volume to accommodate large boilers. The boiler room roof is parapeted, slopes to the rear and supports a rectangular light monitor on top. The limestone capped parapet steps down towards the rear as does the original 1914 building in front. The connecting mechanical room is one story high with a continuous north-south clerestory that divides the roor with a shallow slope to the east and west. The boilers were vented to a tall red brick masonry smokestack. The current 178 foot smokestack replaced an earlier one in 1949.

A large two-story component was added in 1921 to the west of the original 1914 building. This addition is very similar to the original 1914 building with the same parapeted roof details and forms a continuous masonry front facade. According to a photograph printed in a 1938 25th anniversary bulletin, windows across the entire front facade were wood frame, one-over-one, double-hung windows with limestone lintels and sills. Windows on the second floor of the original 1914 building were smaller six-light, wood frame sash with limestone lintels and sills. "Johnson Creamery Co." was painted across the parapet of the front covering both the original 1914 building and the 1921 addition. Other signage was painted on the second floor at the southeast corner of the original 1914 building.

Sometime after 1914, a freestanding, one-story garage was constructed on the alley west of the complex. The garage was later linked to the complex with the 1927 construction of an ice house. The ice house is three stories high and was originally a single volume inside for stacking ice. Its low-pitched gable roof slopes to the north and south with stepped parapet end gables and limestone capstones. The pilastered brick facade is symmetrically adorned with simpie brickwork, small limestone blocks and limestone banding.

In 1951, a two-story addition replaced a freestanding house on the alley in front of the freestanding garage described above. The 1951 addition connected to and provided a second story over the freestanding garage. The 1951 addition also included: a one-story enclosed loading bay on the west facade of the 1921 addition,

## United States Department of the Interior <br> National Park Service

# National Register of Historic Places Continuation Sheet 

Section number 7 Page 2 Johnson's Creamery, Bloomington, Monroe Co., IN

with a concrete block west wall; a second story connecting passage to the 1921 addition across the front of the ice house; and a covered loading area on the ground floor in front of the ice house. The loading area sloped to below the first floor grade so that trucks could back up and load from a dock at the rear. The loading area was covered with a steel bar joist roof structure with wood decking and asphalt rooting.

Two freestanding buildings were also found on the property at the beginning of the project. These included a large concrete block garage built in 1949 and a smail concrete block storage building built around the time of the 1951 addition.

The following list chronologically specifies each of the components described above for reference throughout the remainder of the application:

1. original 1914 building
2. vaulted space (between 1914 and 1927)
3. boiler room (between 1914 and 1927)
4. mechanical room (between 1914 and 1927)
5. 1921 addition
6. freestanding garage (between 1914 and 1921)
7. ice house (1927)
8. smokestack (1949)
9. concrete block garage (1949)
10. 1951 addition
11. small concrete block building (1951).

The Creamery survived continuous upgrades in plant operations, a fact well reilected in the more advanced building technologies found in its later additions. The 1914 portion was framed within its brick walls with timber posts, beams, joist work, and floors. In the 1921 addition and the ice house the interior structural components were steel columns, web and bar joists, and concrete floors, and by 1951 the new office addition was a block structure with brick veneer and aluminum windows.

Due to the changing nature of the Johnson's Creamery business, many changes were made to the complex over the years, both inside and outside. Window and door openings were added, infilled or moved. Window sash and doors were replaced. Vents, tanks and other equipment were added, especially at the rear of the building. Loading docks were added at the front of the building. Innumerable changes were made to the inside of the complex as dairying and refrigeration processes changed and developed and as Johnson's management made decisions on the operation of the business. Large rooms were divided into smaller work or refrigeration areas, floor levels were altered to accommodate new equipment and the need to drain liquids and walls were tiled to provide an easily cleaned surfice. Interior partition walls were built of a variety of materials including:

- plaster and tile over brick and plaster and tile over concrete block in the 1914 and 1921 sections of the building
- cork, adhered and coated with an asbestos adhesive, over concrete block or brick in the ice house and former freestanding garage area that was converted to reirigeration areas
- concrete parged concrete block or brick in the 1951 addition and former freestanding garage area
- sheet metal and asbestos board panels over cork or concrete parged block or brick in the former freestanding garage area
- drywall and plaster over wood frame and parged or painted concrete block in the 1951 addition.


## United States Department of the Interior <br> National Park Service

## National Register of Historic Places Continuation Sheet

Section number 7 Page 3 Johnson's Creamery, Bloomington, Monroe Co., IN


#### Abstract

After creamery operations ceased at the complex in 1987, large areas of interior and exterior wails and the root were broken out to remove and salvage large steel tanks that were built into their locations. A temporary pyramidal roof structure was built at the southwest corner of the 1921 addition to cover a hole created for a crane to remove the large tanks. Finally, the building was subject to vandalism and grafititi during its six year period of standing empty without maintenance. The current owner is completing a historic rehabilitation that began in January 1994. The building is now known as the Johnson's Creamery Business Center and houses professional offices.


# National Register of Historic Places Continuation Sheet 

Section number 8 Page 4 Johnson's Creamery, Bloomington, Monroe Co., IN


#### Abstract

Summary The Johnson's Creamery building is significant for its association with early twentieth century industry in Bloomington as the structure, from 1914 to 1987, in which dairy products and ice were produced and sold and from which they were distributed door to door. The Creamery is one of very few intact industrial buildings in Bloomington, Indiana, located one block north and two blocks west of the courthouse square within Bloomington's near west side industrial corridor. First constructed in 1914, the red brick building grew to the large complex of various additions that stands today through a series of major building stages up to 1951. The complex took shape according to the developing nature of the creamery business and the constraints of its site: railroad tracks to the east, and the city's street grid to the south, west and north. The current rehabilitation has restored a level of integrity augmenting its significance as one of very few intact examples in Bloomington of a functional, industrial architectural style. The most unique identifying features of this two and three-story unpainted red brick factory building are the three-story ice house and the 178 foot tall brick smokestack with white glazed bricks that vertically spell "Johnson's" and serves as a long-standing Bloomington landmark.

\section*{History and Context}

Johnson's Creamery can be evaluated in the historic context of business and industry in Bloomington between 1914 and 1951. The limestone industry provided the major source of income for Monroe County from the 1890's until World War II. Bloomington's economy was further diversified with several small industries, the Showers Brothers Company Furniture Factory, numerous commercial establishments and Indiana University. The Showers Brothers Company reached its zenith of operation in the 1920's when it produced $60 \%$ of the furniture built in this country, greatly expanded its facilities and employed more than 2000 people.


Other Bloomington industries, including Johnson's Creamery, experienced similar prosperity. They were: the Nurre Mirror Plate Glass Company, which furnished all the mirrors used in the Showers Brothers Company's furniture; the Bloomington Basket Company, which produced fruit and vegetable baskets; the Cantol Wax Company, which produced wax cleaning and lubricating products (building listed on the National Register of Historic Places, April 24, 1990); the Field Glove Company, which produced mittens and gloves; and the Seward and Company foundry and machine works. Johnson's Creamery, which produced milk, cream, ice cream, butter, cottage cheese, chocolate milk, buttermilk, orange drink and ice, can be evaluated within the context of Bloomington's industries. The Creamery, the Cantol Wax building and the Showers complex are the only intact structures from among this list of industries. The Creamery can also be evaluated within the context of creameries in Indiana.

## History of lohnson's Creamery

Ward W. and Ellis W. Johnson founded the Johnson Creamery Company in 1913. The two brothers first operated a dairy on South Washington Street in 1912, where the company continued to maintain stables for delivery wagons and horses after moving to the West 7th Street address and until at least 1938. The new plant was completed in 1914 and was ideally located in downtown Bloomington's industrial corridor next to the Illinois Central railroad tracks and other industrial and commercial establishments.

Rapidly outgrowing its original 1914 plant, the factory appended major additions in 1921, 1927, and again in 1951. Large boilers were necessary for the production of power to operate the plant and required tall

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# National Register of Historic Places Continuation Sheet 

Section number 8 Page 5 Johnson's Creamery, Bloomington, Monroe Co., IN

smokestacks for venting. These needs shaped the addition of mechanical spaces onto the original 1914 building. Subsequent additions and interior alterations also reflected the needs of the dairying process.

The Creamery processed dairy products from local milk suppliers and delivered its produce to the surrounding community in horse drawn wagons as late as 1939 before fully switching to motorized transport. Cutting and storing blocks of ice was a necessary sub-process to the creamery business before the advance of refrigeration technology in the late 1930's and 1940's. For this reason, the construction of the large threestory high ice house was important to the expansion of the business in the 1920's. "Today's Milk Today," the Johnson's slogan in the 1930's, told customers that the company knew the importance of moving the milk from the cow to the customer quickly. In 1938, Johnson's employed 70 people who produced and delivered properly pasteurized milk and dairy products including: coffee and whipping cream; "made-to-measure" ice cream; "Shady Brook" butter; cottage cheese; chocolate milk; "Creamo" (cultured creamed buttermilk); Johnson's Orange drink; and distilled water ice. The company also operated a retail department that sold the dairy products as weil as, ice, in a small house north of the plant that was replaced with the 1951 addition. The 1951 addition retained a retail area with an ice cream counter. Most of Johnson's products were however, sold through home delivery with only $15 \%$ of its products sold to stores in the 1930's.

The number of licensed dairy plants in Indiana grew throughout the 1920's and 1930's from 234 in 1924 to over 400 throughout most of the 1940's. Most were family owned and operated with a limited geographical scope due to the constraints of refrigeration technology. As that technology advanced, the number of licensed dairy plants in Indiana declined to 224 in 1956 and has continued to decline with consolidation and competition from large supermarkets to a mere 48 in 1982. Chains such as Kroger in the Midwest and Safeway in the East, maintain their own dairies and use milk as a loss leader sales item. The increased shelf life of milk to three weeks has also contributed to the rise of large centralized dairies located closer to the milk supply, which is north of Indianapolis for the State of Indiana.

Johnson's Creamery fell victim to this trend when it vacated the building in 1987 and sold out to a larger dairy, Maplehurst, in Indianapolis a few years later. The complex remains however, as a clear example of this once important aspect of the Bloomington and Monroe County economy. The Creamery kept eighty area farmers in business from whom they bought the raw milk and employed as many as 100 people in the 1950's. It was noted as one of the larger dairies and the largest ice-manufacturer in southern Indiana. It was also known as one of the more desirable and steadfast employers in the area and as a reliable source of good quality products.

The Johnson's Creamery building is eligible for listing on the National Register under criterion A for its association with industry in Bloomington and the dairy business in Indiana. Among the historic Bloomington industries listed above, Johnson's Creamery was one of only a few, the limestone industry and Indiana University, to survive past the 1950's. A household name for 75 years, Johnson's, still holds significance for the Bloomington community in the symbol of the Creamery building and smokestack.

## Architecture

Structures associated with historic industrial uses in Bloomington that were identified in the Indiana Historic Sites and Structures Inventory: City of Bloomington, Interim Report include: the Coca-Cola Bottling Company

# National Register of Historic Places Continuation Sheet 

Section number 8 Page 6 Johnson's Creamery, Bloomington, Monroe Co., IN

Building (ca. 1930; 153-055-80113; rated "notable") at 318 South Washington Street; the Bloomington Wholesale Foods Warehouse (1920; 153-055-80068; rated "contributing") at 300 West 7th Street; the Cantol Wax Company Building (ca. 1905; 153-055-80043; rated "contributing;" listed on the National Register, April 24,1990 ) at 211 North Washington Street; and the Showers Brothers Furniture Company Building [sic] (19091924; 153-055-80064; rated "outstanding").

In addition, several structures associated with historic industrial and commercial uses in Bloomington have been identified as contributing to the proposed West Side Historic District. These include the Johnson's Creamery building itself, the I. Fell Building, at 201 South Rogers Street, the Bloomington Garage building at 316 West 6 th Street, the Curry Buick building at 218 West 7th Street and the Bloomington Frosted Foods building at 213 South Rogers Street. The current rehabilitation of the Johnson's Creamery building has restored sufficient integrity that it can be considered individually eligible for the National Register as well as, contributing to the proposed West Side Historic District.

The Johnson's Creamery building is eligible for listing on the National Register under criterion C for its characteristics that reflect an industrial architectural style. Brick masonry, stepped parapets, wood windows on older buildings and aluminum and steel sash on newer buildings and additions and functional unadorned facades with minimal architectural detail are characteristics of this industrial architectural style shared by the Creamery and the other buildings listed above. Among these buildings, only the Showers building was listed as "outstanding," and is considered eligible for listing on the National Register as part of a complex of Showers related buildings. Only the Cantol Wax building is listed individually on the National Register. The Creamery, in its newly rehabilitated state, now displays a comparable level of integrity with these two buildings and persuasively portrays the industrial heritage of Bloomington.

The Creamery building is also eligible for listing on the National Register under criterion C for its characteristics that reflect the creamery business and distinguish it as such. Built during the height of industrial success in the 1920's in Bloomington, the 1921 addition and the 1927 ice house both reflect a style that was practical, industrial and functional for the processing of milk and the storage of ice. The ice house also presented a more stylish facade with decorative architectural details built into the brick and limestone masonry. Although the simple rhythm of the street facade partially disguises the building's true purpose, other features reveal it, such as the ice house that rises from the middle of the complex and the landmark smokestack that rises from behind it. These exterior features and other interior features clearly indicate factory functions. Long, open rooms for processing operations, arch-vault ceilings for ice loads, tall mechanical spaces for compressors and boilers, and a continuous rhythm of large double hung windows, roof monitors and clerestories for natural light all speak the language of technological space. Similarly, interior wall finishes of painted plaster and glazed concrete block, and quarry tile over concrete floors reflect the sanitary surroundings necessary for dairy production.

## United States Department of the Interior

National Park Service

## National Register of Historic Places <br> Continuation Sheet

Section number _ Page $\quad$ Johnson's Creamery, Bloomington, Monroe Co., IN

## Bibliography

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Johnson Creamery Company brochure, "A Quarter Century —of Progress and Service," 1938.
Martin, Bob. Former plant manager, Johnson's Creamery. Interviews.
Orelup, Margaret. Johnson Creamery, Historic Preservation Certification Application, Part 1 - Evaluation of Significance. April 1987.

Sanborn Insurance Maps: 1913, 1927, 1947.

## United States Department of the Interior <br> National Park Service

# National Register of Historic Places Continuation Sheet 

Section number _10 Page _ J_ Johnson's Creamery, Bloomington, Monroe Co., IN

## Verbal Boundary Description

Beginning at the intersection of the east curbline of the ailey between North Rogers Street and the CSX railroad and the north curbline of West 7th Street, proceed east along the north curbline of West 7th Street to the $\operatorname{CSX}$ railroad right-of-way. Then proceed northwest along the west boundary of the $\operatorname{CSX}$ railroad right-ofway to the south curbline of West 8th Street. Then proceed west along the south curbline of West 8th Street to the east curbline of the alley between North Rogers Street and the CSX railroad. Then proceed south to the point of beginning.

## Boundary Justification

The described boundary includes the property historically associated with and owned by the Johnson's Creamery. The boundaries are slightly larger than the private property boundary to compensate for an encroahment of the building into the public right-ot-way.

Basis of Loading

Wind

- Based on ASCE 7-10, "Minimum Design Loads for Buildings and Other Structures"
- Chapter 29: Wind Loads on Other Structures and Building Appurtenances MWFRS
- Chapter 1: General
- Chapter 2: Combinations of Loads
- Chapter 26: Wind Loads: General Requirements
- Building Risk/Occupancy Category III - Buildings and other structures, the failure of which could pose a substantial risk to human life
- Exposure Category B - Urban and suburban area prevails for a distance greater than 2,600 ft or 20 times the height of the building ( $2,800 \mathrm{ft}$ ), whichever is greater.
- Basic Wind Speed for Occupancy Category III - 120 mph ( 3 sec gust wind speed at 33 ft )
- Structure Type for Wind Directionality - Round Chimney
- No Hills or Escarpments to increase wind due to topographic factors.
- The stack has a Round cross-section and Rough ( $D^{\prime} / D=0.02$ ) surface type.
- Structure is assumed to be a Dynamically Sensitive Structure.

Seismic

- Based on ASCE 41-13, "Seismic Evaluation and Retrofit of Existing Buildings"
- Chapter 13: Architectural, Mechanical, and Electrical Components
- Chapter 2: Performance Objectives and Seismic Hazards
- Site Class B: Rock with 2,500ft/s < $v_{\mathrm{s}}<5,000 \mathrm{ft} / \mathrm{s}$
- Unbraced Cantilever Component - Stack
- Component Importance Factor, $\mathrm{I}_{\mathrm{p}}=1.5$ - Operational Nonstructural Performance Level
- Fundamental Period, $T_{p}=3.1 \mathrm{sec}$


[^0]:    * Does not apply to egress hardware.

[^1]:    Narrative Description
    (Describe the historic and current condition of the property on one or more continuation sheets.)

[^2]:    9. Major Bibliographic References

    Bibliography
    (Cite the books, articles, and other sources used in preparing this form on one or more continuation sheets.)
    Previous documentation on file (NPS):
    Primary location of additional data:
    $\boxtimes$ preliminary determination of individual listing (36
    $\square$ State Historic Preservation Office
    CFR 67) has been requested
    $\square$ previously listed in the National Register
    $\square$ Other State agency
    previously determined eligible by the National Register
    $\square$ designated a National Historic Landmarkrecorded by Historic American Buildings Survey \#Federal agency
    $\square$ Local government
    $\square$ University
    Q Other
    $\square$ recorded by Historic American Engineering
    Record \#
    Name of repository:

