



MEMO

TO: Opal Valley Developments, c/o Tony Priori
FROM: Chelsey Collins (Tyers), Cultural Heritage Specialist, WSP Canada Inc.
Heidy Schopf, Cultural Heritage Lead, WSP Canada Inc.
SUBJECT: 11185 Airport Road Heritage Impact Assessment Addendum
DATE: August 8, 2024

1 BACKGROUND

In May 2024, WSP Canada Inc. (WSP) was retained by Opal Valley Developments to prepare an addendum to the Heritage Impact Assessment (HIA) for 11185 Airport Road (Sargent Farmhouse), City of Brampton produced by WSP in January 2024. In May 2021, Bramcon Engineering Limited retained Golder Associates Ltd. (Golder), now WSP to conduct an HIA for a listed heritage property at 11185 Airport Road in the City of Brampton, Ontario. WSP determined the property to be of cultural heritage value or interest and recommended that the Sargent Farmhouse be relocated to Lot 8 within the subdivision.

The property and development application has since been transferred to Opal Valley Developments (the client). A Structural Condition Assessment was completed by Tacoma Engineers in March 2024 and concluded that the building at 11185 Airport Road is not a good candidate for relocation (Appendix A). This addendum has been prepared in response to the City of Brampton's request for a revised HIA to address the revised development proposal and additional alternative and mitigation options. The additional alternative options WSP was tasked with reviewing included:

- **Option 1:** Complete disassembly and reassembly of the Sargent Farmhouse on Lot 8;
- **Option 2:** Disassembly and reassembly of two of the Sargent Farmhouse facades on Lot 8 with a large addition and new floor plan;
- **Option 3:** Demolition of the Sargent Farmhouse and replication of the Farmhouse using new materials, with a large addition and a new floor plan on Lot 8; and,
- **Option 4:** Demolition of the Sargent Farmhouse and construction of a new house with no reference to the design of the Farmhouse, nor any salvaged materials on Lot 8.

The client conducted meetings and email correspondence with the City of Brampton's Heritage Staff to develop the current plans for a dwelling at Lot 8. At a meeting on May 29, 2024, with City of Brampton Heritage Staff, the client, their planning consultants and WSP, there was direction to amend alternative Option #2 to reflect the client's current development plans for Lot 8. A detailed description of the proposed development on Lot 8 is provided under the 'Proposed Works' section of this addendum.

In email correspondence dated July 16, 2024, Tacoma's Structural Engineer, Will Teron, estimated that approximately 60-70% of the brick was in sufficient condition for salvage and reuse on a new structure based on their site visit conducted in March 2024 and their review of the exterior bricks (Appendix B). Teron noted that interior bricks are often not treated such that they are suitable for exterior use. As such, the definitive amount of salvageable and reusable bricks will not be known until the farmhouse is disassembled.



The recommendations in this addendum are provided upon the presumption that the City of Brampton is satisfied with the findings of the Structural Assessment completed by Tacoma Engineering in March 2024.

2 STATEMENT OF CULTURAL HERITAGE VALUE OF INTEREST

The following statement of cultural heritage value or interest is reproduced from the HIA for 11185 Airport Road, January 2024.

2.1 DESCRIPTION OF PROPERTY – 11185 AIRPORT ROAD, CITY OF BRAMPTON

The property is located at 11185 Airport Road in the City of Brampton, Peel Region, formerly within the east half of Lot 16, Concession 7 NERV DIV, in the Township of Toronto Gore, County of Peel. The property is legally described as PT LT 16 CON 7 ND (TOR. GORE) DES PT 1 PL 43R-31731; BRAMPTON. The 1.09-hectare property includes the Sargent Farmhouse, a brick farmhouse built between 1861 and 1877, and associated driveshed and grain bin.

2.2 STATEMENT OF CULTURAL HERITAGE VALUE OR INTEREST

The property has cultural heritage value or interest for its design or physical value, its historical or associative value, and for its contextual value. The property's design or physical value is linked to its storey-and-a-half farmhouse, known locally as the Sargent Farmhouse. Built after 1861 but before 1877, the Sargent Farmhouse was built on a fieldstone foundation in red brick with buff brick detailing and decoration, including quoins, gauged or rubbed brick voussoirs, a frieze of circular forms, and diamond patterns below the gables. It has a T-shaped plan with a rectangular main block and rear wing off the east end wall. The main block has asymmetrical fenestration with a slightly off-centre recessed main entrance with a moulded architrave, sidelights, fanlight, Doric pilasters, and entablature marked by two large six-by-six flat windows on either side. It has a gable roof with return eaves and a single chimney on its south end wall. Its double-wythe masonry on the principal façade is entirely in stretcher bond and the other walls are one-in-five American or common bond. Like the main block, it has asymmetrical fenestration with an open verandah along the length its south façade. The Sargent Farmhouse has a good level of heritage integrity as a representative example of a late 19th century Neoclassical rural farmhouse executed with a high degree of craftsmanship in its detail and overall composition.

The property's historical or associative value lies in its direct association with William Sargent, who was not only successful in the mixed farming that was central to the area's economy during the 19th century, but also played a leading role in the community's social development as the warden for Tullamore's St. Mary's Church. William inherited the farm from his father Benjamin Sargent, an early 19th century settler of Toronto Gore township, and the Sargent family were recognized as a pioneering family of the area.

For its extensive decoration and location at the crest of the valley land and in proximity to Airport Road, the Sargent Farmhouse has contextual value as a local landmark.



2.3 HERITAGE ATTRIBUTES

The heritage attributes demonstrating the property's cultural heritage value or interest are its:

- Sargent Farmhouse in Neoclassical style with:
 - Load-bearing double wythe brick masonry on a fieldstone foundation built in stretcher course on the principal façade and the other walls are one-in-five American or common bond
 - Side gable main block with asymmetrical fenestration with a recessed main entrance with moulded architrave, sidelights, fanlight, Doric pilasters, and entablature marked by six-over-six windows with buff brick voussoirs and quoins on either side
 - Buff brick architectural detailing, including quoins, gauged or rubbed brick voussoirs, a frieze with circular forms below the eaves, and a diamond pattern below the gables
 - Projecting eaves and verges with plain soffit, fascia, and frieze with return eaves on the gable ends, and a single-stack brick chimney (south end wall)
 - Rear wing extending from the east wall of the main block with asymmetrical fenestration, open verandah along south façade, one-in-five American or common bond masonry on all walls, and gable roof with plain soffit, fascia, and frieze

3 DESCRIPTION OF PROPOSED DEVELOPMENT/SITE ALTERATIONS

In light of the results of the Structural Assessment completed by Tacoma Engineers, the client is now proposing to disassemble the Sargent Farmhouse and to build a new dwelling on Lot 8 of the draft plan of subdivision (as-found plans for the Sargent Farmhouse are located in Appendix C and development plans for Lot 8 are located in Appendix D).

The client has relayed that the current plans for Lot 8, reflect an attempt to use as much salvaged brick on the west section of the dwelling with a design that is inspired by the Sargent Farmhouse, but does not replicate it, to allow for a large house on the Lot in keeping with the design of the other proposed dwellings in the subdivision. The plans are also the result of the client's ongoing consultation with the City of Brampton's Heritage staff. In various email correspondence from May 2024, City of Brampton Heritage Staff requested that the client consider changes to the roof profile of the two-storey part of the house, as well as disconnecting the roofs of the west section and the two-storey part of the house, including a chimney (however it was added to a side elevation rather than the roof as it is on the Sargent Farmhouse), and to amend the large picture window on the south elevation of the west section to two smaller windows. The current proposed development drawings revised June 13, 2024 (Appendix D) reflect and incorporate these Staff comments.

3.1 WEST SECTION

The new dwelling will include a west section fronting onto Airport Road which will include the reuse of as many reclaimed bricks from the Sargent Farmhouse as possible. The west elevation of the west section does not replicate the front façade of the Sargent Farmhouse but is influenced by it in the use of a three-bay width, with a slightly off-centre front entry, a buff brick band detail under the eaves and quoin detail modeled on the design of the Sargent Farmhouse. The side (north and south) elevations of the west section do not replicate the design of the Sargent Farmhouse but take inspiration from it in the use of buff brick quoin details, diamond brick detail and return eaves.



3.2 EAST SECTION

The east section of the dwelling is located behind the west section, fronting onto Lauderhill Road within the new subdivision and consists of a two-storey section that reflects a design in keeping with the remainder of the proposed subdivision. It includes a cross hipped roof, vertically oriented rectangular windows, a double front door with transom light and a three-car garage. This section of the dwelling will be constructed entirely of new materials but continues use of some of the design features inspired by the Sargent Farmhouse including the red-brick with buff-brick detailing in the quoining and window surrounds. The east section of the proposed dwelling also includes the dining room at the main level and bedrooms on the upper level. The east elevation drawing was not available at the time of this review.

4 IMPACT ASSESSMENT

When determining the effects a development or site alteration may have on known or identified built heritage resources or cultural heritage landscapes, the MCM *Heritage Resources in the Land Use Planning Process* advises that the following “negative impacts” be considered:

- Destruction of any, or part of any, significant heritage attributes, or features¹
- Alteration that is not sympathetic, or is incompatible, with the historic fabric and appearance²
- Shadows created that alter the appearance of a heritage attribute or change the viability of a natural feature or plantings, such as a garden³
- Isolation of a heritage attribute from its surrounding environment, context or a significant relationship⁴
- Direct or indirect obstruction of significant views or vistas within, from, or of built and natural features⁵
- A change in land use such as rezoning a battlefield from open space to residential use, allowing new development or site alteration to fill in the formerly open spaces⁶
- Land disturbances such as a change in grade that alters soils, and drainage patterns that adversely affect a cultural heritage resource⁷

Other potential impacts may also be considered such as encroachment or construction vibration (Figure 1). Historic structures, particularly those built in masonry, are susceptible to damage from vibration caused by pavement breakers, plate compactors, utility excavations, and increased heavy vehicle travel in the immediate vicinity. Like any structure, they are also threatened by collisions with heavy machinery, subsidence from utility line failures, or excessive dust (Randl 2001:3-6).

¹ This is used as an example of a *direct* impact in the MHSCTI *Info Bulletin 3*.

² A *direct* impact in the MHSCTI *Info Bulletin 3*.

³ An *indirect* impact in the MHSCTI *Info Bulletin 3*.

⁴ An *indirect* impact in the MHSCTI *Info Bulletin 3*.

⁵ An example of a *direct* and *indirect* impact in the MHSCTI *Info Bulletin 3*. It is a *direct* impact when significant views or vistas within, from or of built and natural features are obstructed, and an *indirect* impact when “a significant view of or from the property from a key vantage point is obstructed”.

⁶ A *direct* impact in the MHSCTI *Info Bulletin 3*.

⁷ In the MHSCTI *Heritage Resources in the Land Use Planning Process* this refers only to archaeological resources but in the MHSCTI *Info Bulletin 3* this is an example of a *direct* impact to “provincial heritage property, including archaeological resources”.

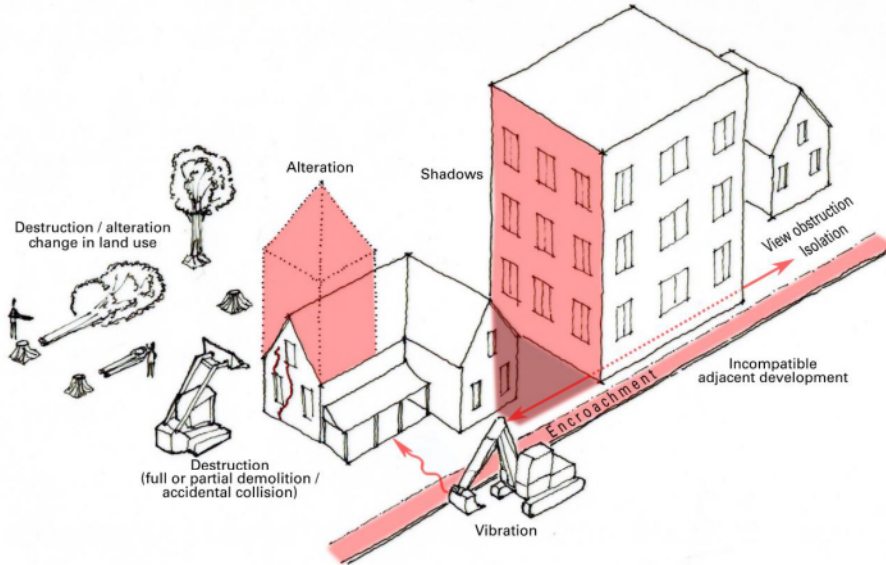


Figure 1: Examples of negative impacts.

Although the MCM Heritage Resources in the Land Use Planning Process identifies types of impact, it does not advise on how to describe its nature or extent. For this the MCM Guideline for Preparing the Cultural Heritage Resource Component of Environmental Assessments (1990:8) provides criteria of:

- **Magnitude** - amount of physical alteration or destruction that can be expected
- **Severity** - the irreversibility or reversibility of an impact
- **Duration** - the length of time an adverse impact persists
- **Frequency** - the number of times an impact can be expected
- **Range** - the spatial distribution, widespread or site specific, of an adverse impact
- **Diversity** - the number of different kinds of activities to affect a heritage resource

Since advice to describe magnitude is not included in the MCM *Guideline* or any other Canadian guidance, the ranking provided in the ICOMOS *Guidance on Heritage Impact Assessments for Cultural World Heritage Properties* (ICOMOS 2011: Appendix 3B) is adapted here. While developed specifically for World Heritage Sites, it is based on a general methodology for measuring the nature and extent of impact to cultural resources in urban and rural contexts developed for the UK Highways Agency *Design Manual for Roads and Bridges* [DMRB]: *Volume 11*, HA 208/07 (2007: A6/11) (Bond & Worthing 2016:166-167) and aligns with approaches developed by other national agencies such as the Irish Environmental Protection Agency (reproduced in Kalman & Létourneau 2020:390) and New Zealand Transport Agency (2015).

The ICOMOS impact assessment ranking is:

- Major
 - Change to key historic building elements, such that the resource is totally altered. Comprehensive changes to the setting.



- Moderate
 - Change to many key historic building elements, such that the resource is significantly modified.
 - Changes to the setting of an historic building, such that it is significantly modified.
- Minor
 - Change to key historic building elements, such that the asset is slightly different.
 - Change to the setting of an historic building, such that it is noticeably changed.
- Negligible
 - Slight changes to historic building elements or setting that hardly affect it.
- No impact
 - No change to fabric or setting.

An assessment of potential impacts resulting from the proposed development on the Sargent Farmhouse's CHVI and heritage attributes is presented in Table 1.

Table 1: Impact Assessment of the Proposed Development of the Property

POTENTIAL IMPACT	ANALYSIS OF POTENTIAL IMPACT	IMPACT WITHOUT MITIGATION	IMPACT WITH MITIGATION
Destruction of any, or part of any, significant heritage attributes, or features	As currently proposed, the development includes dismantling the Sargent Farmhouse, reclaiming the brick and reusing the brick on the west section of a new dwelling. Without mitigation this could result in destruction of the identified heritage attributes, a direct and major impact that is irreversible, site specific, and will occur once over a short period of time.	Major impact from dismantling the Sargent Farmhouse that is irreversible, site-specific, and will occur once over a short period of time.	By implementing the recommendations in 'Results of Options Analysis and Recommendations' section 5, the potential direct impact from dismantling the farmhouse will be reduced to a moderate, irreversible, and site-specific impact that will occur once over a short period of time.
Alteration that is not sympathetic, or is incompatible, with the historic fabric and appearance	The current plans consist of reusing salvaged brick on the west section of a new dwelling on Lot 8, in a design influenced by the Sargent Farmhouse. While the design will be influenced by the Sargent Farmhouse, it will not accurately reflect the design of the Farmhouse which is inconsistent with guiding heritage principles. Furthermore, it will be moved from its current location to a much smaller lot and will be part of a much larger dwelling reflecting a similar design to other dwellings in the proposed subdivision. This will result in major, irreversible and site-specific change that will occur once over a short period of time.	The development will result in major impact to the Sargent Farmhouse from loss of the design of the original farmhouse, its change in location and its attachment to a much larger dwelling, resulting in irreversible and site-specific impacts will occur once over a short period of time.	While implementing the recommendations in 'Results of Options Analysis and Recommendations' section 5 may help with some of the interpretation issues resulting from a lack of accuracy in the reconstruction, the direct impact from alteration of the Sargent Farmhouse remains major, irreversible and a site-specific change over a short period of time.



POTENTIAL IMPACT	ANALYSIS OF POTENTIAL IMPACT	IMPACT WITHOUT MITIGATION	IMPACT WITH MITIGATION
Shadows created that alter the appearance of a heritage attribute or change the viability of a natural feature or plantings, such as a garden	As currently proposed, the Sargent Farmhouse will be disassembled and reclaimed brick will be used on the west section of a new dwelling on Lot 8. While the proposed new dwelling will be one-storey taller than the Sargent Farmhouse, no significant shadows are anticipated that will alter the appearance of the recreated facades of the Sargent Farmhouse. No natural features or planting were identified as heritage attributes of the property.	No impact	No mitigation required
Isolation of a heritage attribute from its surrounding environment, context or a significant relationship	As described in Section 6.3 of the Heritage Impact Assessment (January 12, 2024), there is no recognized connection between the Sargent Farmhouse and surrounding properties or environment.	No Impact	No mitigation required
Direct or indirect obstruction of significant views or vistas within, from, or of built and natural features	No significant views or vistas were identified in the Statement of Cultural Heritage Value or Interest and list of heritage attributes in the Heritage Impact Assessment (January 12, 2024).	No impact	No mitigation required
A change in land use such as rezoning a battlefield from open space to residential use, allowing new development or site alteration to fill in the formerly open spaces	The proposed development will result in a change in land use, but this has been approved as part of the Secondary Plan Area 49. As proposed, the development will reuse bricks from the Sargent Farmhouse for cladding the west section of a new residence, which is in accordance with the designated land use of the property.	No impact	No mitigation required



POTENTIAL IMPACT	ANALYSIS OF POTENTIAL IMPACT	IMPACT WITHOUT MITIGATION	IMPACT WITH MITIGATION
<p><i>Land disturbances such as a change in grade that alters soils, and drainage patterns that may affect a cultural heritage resource.</i></p>	<p>As proposed, the Sargent Farmhouse will be disassembled and reclaimed brick will be used on the west section of a new dwelling on Lot 8. Land disturbances such as excessive vibration or dust will be negligible if the farmhouse is disassembled before land disturbances occur. If land disturbances are undertaken around the farmhouse before it is demolished, potential impacts range from major to negligible, irreversible and/or reversible and site-specific change that will occur over a short period of time.</p>	<p>At worst case the development will result in major impact to the Sargent Farmhouse from land disturbances that is irreversible, site specific and will occur over a short period of time.</p>	<p>By implementing the recommendations in <i>Results of Options Analysis and Recommendations</i> (Section 5), the potential direct impact from land disturbances to the Sargent Farmhouse will be reduced to No impact or negligible.</p>



4.1 RESULT OF IMPACT ASSESSMENT

The preceding assessment concludes that without mitigation the proposed development of the property will result in:

- Potential major negative impact to the Sargent Farmhouse from destruction, alteration and land disturbances.

5 CONSIDERATION OF ADDITIONAL ALTERNATIVES AND MITIGATION OPTIONS

Further to the Heritage Impact Assessment (January 12, 2024) and in light of the March 2024 Structural Assessment completed by Tacoma Engineers, WSP has been tasked with reviewing four additional options to reduce or avoid the negative effects. These have been informed by the City of Brampton’s Heritage Planning staff and are:

- **Option 1:** Complete disassembly and reassembly of the Sargent Farmhouse on Lot 8;
- **Option 2:** Disassembly of the Sargent Farmhouse and construction of a new dwelling on Lot 8, the west section of which will include a design influenced by the Sargent Farmhouse clad in salvaged brick (currently proposed, Appendix D).
- **Option 3:** Demolition of the Sargent Farmhouse and replication of the Farmhouse using new materials, with a large addition and a new floor plan on Lot 8; and
- **Option 4:** Demolition of the Sargent Farmhouse and construction of a new house with no reference to the design of the farmhouse, nor any salvaged materials on Lot 8.

The advantages and disadvantages of each option are presented in the following subsections, then analysed for feasibility. It is only after an option is determined to be not feasible that the next preferred approach is considered.

5.1 OPTION 1: COMPLETE DISASSEMBLY AND REASSEMBLY OF THE SARGENT FARMHOUSE ON LOT 8

Under this option, the Sargent Farmhouse would be disassembled and reconstructed with the original bricks as much as possible on Lot 8. There could be a new layout inside the dwelling, but the exterior would reflect the current exterior of the Sargent Farmhouse.

Advantages: While relocation and dismantling of an existing heritage resource should be employed as a last resort, it is appropriate where protection cannot be achieved by any other means. Relocation would also mean its legibility as a farmhouse would be reduced, but the reconstructed Sargent Farmhouse relocated to a new lot within the development would have a “progressive authenticity” (Jerome 2008: 4) where its heritage attributes are conserved, it retains a physical connection with its original parcel, it is visible to the public and provides an opportunity to increase understanding of the City’s architectural heritage. It would also enable the property to be fully developed as a new community, sustainably integrating the Sargent Farmhouse through retention of its “embodied energy”. As outlined in Section 5.1 of the Heritage Impact Assessment (January 12, 2024) there are structural concerns with the foundation of the house which relocation would assist to resolve. Additionally, the rear wing (a heritage attribute) would be disassembled and reconstructed. This option is also consistent with the City of Brampton’s Official Plan policy 4.10.1.8 that expresses heritage resources will be protected and conserved in accordance with the *Standards and Guidelines for the Conservation of Historic Places in Canada* and the



Appleton Charter for the Protection and Enhancement of the Built Environment that both speak to dismantling and rebuilding being appropriate when overall condition requires more than repair or limited replacement.

Disadvantages: There is a risk of accidental damage to the bricks, windows and doors during the dismantling process. Challenges also exist with the conditions of some of the bricks and the wood windows and doors. Tacoma Engineer's structural engineer estimates 60-70% of the brick may be in sufficient condition to allow for salvage and reuse. Interior bricks may not be suitable for exterior application, given they were often fired at a lower temperature as they were not meant to be exposed to the elements. While it is reasonable to expect that reconstruction of a heritage structure will require replacement of deteriorated elements, finding appropriate replacement materials can be a challenge. The client would need to procure 30-40% of bricks that match the existing in size, colour, material and texture to complete a full construction (applying triple wythe construction). Even reconstruction of the farmhouse using the brick as cladding on a new underlying structure may require procuring 30-40% of replacement bricks given it is unknown if the interior bricks are suitable for exterior application. Sometimes bricks from heritage buildings can be replaced with bricks salvaged from other heritage buildings, however, it may be difficult to source enough brick, in good condition that match the colour, size, texture and material of the farmhouse. Bricks can be replaced with new bricks, but there is a limited number of suppliers that make historical Ontario size clay bricks.

Reconstruction of Sargent Farmhouse would also incur a high expense, given the required specialized professionals to complete the work, and the time-consuming nature of careful dismantling and reconstruction.

Lastly, it is also in direct opposition to the MCM *Guiding Principle* for "original location" which states that buildings should not be moved "unless there is no other means to save them since any change in site diminishes heritage value considerably".

Feasibility: This option may not be feasible because:

- High expense to disassemble the Sargent Farmhouse and accurately reassembly it brick by brick.
- It is currently estimated that 60-70% of the bricks could be salvaged for reuse, but the accurate rate of salvage will not be known until the farmhouse is disassembled.
- It may be challenging to find a sufficient amount of bricks salvaged from other heritage buildings that match the size, colour, texture and material or new bricks given the limited number of suppliers that make heritage Ontario size bricks.

5.2 OPTION 2: DISASSEMBLY OF THE SARGENT FARMHOUSE AND CONSTRUCTION OF A NEW DWELLING ON LOT 8, THE WEST SECTION OF WHICH WILL INCLUDE A DESIGN INFLUENCED BY THE SARGENT FARMHOUSE CLAD IN SALVAGED BRICK

As previously noted, Option 2 reflects the current development plans for Lot 8 which reflect the result of consultation with the City of Brampton's Heritage Staff (see Appendix D). This option consists of dismantling the Sargent Farmhouse and salvaging the bricks for reuse in a new structure on Lot 8. The west wing of the new dwelling would include a one-storey gable roofed portion where the salvaged bricks would be reused in a design influenced by the Sargent Farmhouse. The bricks would be the only salvaged materials reused on the new dwelling; all other materials would be new. Access to the new dwelling would be from Lauderhill Road, but the recreated Sargent Farmhouse front façade would be visible and prominent from Airport Road. While this option reflects a similar design to the Sargent Farmhouse, it differs from the original design on the west/left side elevation of the west section in the proportions of the elevation, on the south/front elevation in the proportion of



the elevation and configuration of windows, and on the north/rear elevation in the proportions of the elevation, configuration of windows and inclusion of a side chimney.

Advantages: The legibility of the Sargent farmhouse as a former farmhouse and authenticity of the re-envisioned Sargent Farmhouse would be reduced but the use of salvaged brick in a design that is influenced by the Sargent Farmhouse provides some visual continuity to the Sargent Farmhouse and the property's rural history. Using the salvaged brick as cladding on a new structure would also satisfy the structural deficiencies noted in the Structural Assessment. The west elevation draws inspiration from the Sargent Farmhouse while responding to the needs of a new homeowner. The east portion of the dwelling is consistent with the *Appleton Charter for the Protection and Enhancement of the Built Environment* and one of the MCM *Guiding Principles* that speaks to additions reflecting contemporary ideas while respecting and enhancing the spirit of the original structure.

Disadvantages: This option would result in irreversible loss of the Sargent Farmhouse. Although the design of the west section of the new dwelling draws inspiration from the Sargent Farmhouse using reclaimed bricks and architectural style detailing, the lack of authenticity in recreating the design may raise concerns in terms of adhering to heritage principles as there is potential for the re-envisioned Sargent Farmhouse to create the false impression that it reflects the original design of the Farmhouse. The *Standards and Guidelines for Historic Places in Canada* address the appropriateness of dismantling and rebuilding structures where necessary, but also to the importance of relying on photographic and physical evidence. Similarly, the first of the MCM *Eight Guiding Principles in the Conservation of Built Heritage Properties* speaks to respect for documentary evidence, that "conservation work should be based on historic documentation such as historic photographs, drawings and physical evidence" (MCM 2022). This disadvantage could be mitigated in part through an interpretive plan as part of a commemoration plan (see 'Result of the Option Analysis & Recommendation' section 5 for more details). It is also in direct opposition to several of the other MCM *Guiding Principles* including "respect for historical materials" as only the brick will be salvaged, "respect for original fabric" as this principle speaks to "repair[s] to return a resource to its prior condition, without altering its integrity", and "reversibility" as the proposed alterations will never allow the Sargent Farmhouse to be returned to its original condition, nor a facsimile of that original condition.

Feasibility: This option is feasible because:

- It achieves a balance between a new development that takes cues from the existing heritage farmhouse, supports housing objectives and reflects conservation of some of the heritage attributes of the Sargent Farmhouse.
- It would conserve original bricks and recreate some of the features that are identified as heritage attributes such as the buff brick details.
- The new proposed house will be compatible with the proposed fabric, massing and scale of the surrounding subdivision.
- It retains some of the building's embodied energy and would encourage public understanding of the Sargent Farmhouse within a contemporary setting.
- Despite the MCM *Guiding Principle* for "original location", significant structures across North America have been frequently relocated, both historically and in the contemporary period, and under the US National Register for Historic Places this is acceptable when "a building or structure removed from its original location but which is primarily significant for architectural value, or which is the surviving structure most importantly associated with a historic person or event" (Sprinkle 2014:174).



- Interpretative challenges stemming from the re-envisioned Sargent Farmhouse creating a false impression that it reflects the original design of the Farmhouse may be addressed by including recommendations to guide appropriate interpretation in a commemorative plan.

5.3 OPTION 3: DEMOLITION OF THE SARGENT FARMHOUSE AND REPLICATION OF THE FARMHOUSE USING NEW MATERIALS, WITH A LARGE ADDITION AND A NEW FLOOR PLAN ON LOT 8

This option would consist of complete demolition of the Sargent Farmhouse without salvaging any materials. A new, larger dwelling would be constructed on Lot 8, a portion of which would include replication of the Sargent Farmhouse using new materials.

Advantages: While the replicated Sargent Farmhouse would lack authenticity due to use of new materials, the new structure would serve as a physical reminder of the former Sargent Farmhouse for the community.

Disadvantages: This would result in the irreversible loss of all the identified heritage attributes and construction of new dwelling that lacks authenticity. Replication of a building using new materials is not considered best heritage practice unless a building no longer exists and there are no original materials to accurately replicate the building, such is not the case here. It is also in direct opposition to several of the MCM *Guiding Principle* including, “historic material” which encourages “repair/conserv[ation] rather than replace[ment of] building materials and finishes except where absolutely necessary”, “reversibility” which states, “alterations should be able to be returned to original conditions” and “legibility” which states “new work should be distinguishable from old”.

Feasibility: This option is not feasible because:

- It would result in an inauthentic recreation of the Sargent Farmhouse.
- It would result in irreversible loss of CHVI and heritage attributes as well as historic material.
- It would retain none of the farmhouse’s embodied energy, resulting in usable materials wasted.
- There are no mitigation measures that would help satisfy any of the MCM *Guiding Principles*.

5.4 OPTION 4: DEMOLITION OF THE SARGENT FARMHOUSE AND CONSTRUCTION OF A NEW HOUSE WITH NO REFERENCE TO THE DESIGN OF THE FARMHOUSE, NOR ANY SALVAGED MATERIALS ON LOT 8

This option would include demolition of the Sargent Farmhouse with no use of salvaged materials. A new dwelling would be constructed on Lot 8 with no reference to the design of the Sargent Farmhouse nor use of any salvaged materials.

Advantages: This option would result in a dwelling in keeping with the surrounding subdivision but would include no advantages from a heritage perspective.

Disadvantages: This would include the irreversible loss of all the identified heritage attributes resulting in a significant loss to the historic fabric of the City. It is inconsistent with the MCM *Guiding Principles*, the *Standards and Guidelines for Historic Places in Canada*, the *Appleton Charter for the Protection and Enhancement of the Built Environment* and best practices for heritage conservation.

Feasibility: This option is not feasible because:

- It would result in irreversible loss of CHVI and heritage attributes as well as historic material.



- It would retain none of the farmhouse's embodied energy, resulting in usable materials wasted.
- There are no mitigation measures that would help satisfy any of the MCM *Guiding Principles, Standards and Guidelines for Historic Places in Canada* and the *Appleton Charter for the Protection and Enhancement of the Built Environment*.

6 RESULTS OF THE OPTION ANALYSIS AND RECOMMENDATIONS

From a cultural heritage perspective, the below options are ranked from most to least preferred:

- **Option 1:** Complete disassembly and reassembly of the Sargent Farmhouse on Lot 8;
- **Option 2:** Disassembly of the Sargent Farmhouse and recreation of the front façade and west façade using salvaged brick as a cladding on a new larger dwelling on Lot 8 (preferred by the client);
- **Option 3:** Demolition of the Sargent Farmhouse and replication of the Farmhouse using new materials, with a large addition and a new floor plan on Lot 8; and
- **Option 4:** Demolition of the Sargent Farmhouse and construction of a new house with no reference to the design of the farmhouse, nor any salvaged materials on Lot 8.

However, it was determined that **Option 1** may not be feasible given the high expense to disassemble and reassemble the farmhouse and the challenges finding a sufficient amount of replacement bricks to match the existing in colour, size, shape and texture. **Option 2** is the next preferred option. The following short-term, medium-term and long-term actions should be implemented to achieve Option 1 or Option 2.

SHORT-TERM CONSERVATION ACTIONS (PRIOR TO CONSTRUCTION START):

1 Maintenance and Monitoring

- It is recommended to install or maintain security through perimeter fencing to protect from vandalism, fire and break-ins. Should the property not be disassembled before the heating season, minimal heat should be supplied to prevent the building from deterioration and weather conditions. If the farmhouse is not disassembled in the short-term, compile a Heritage Building Protection Plan (HBBP) in accordance with the *Heritage Building Protection Plan: Terms of Reference* (Brampton, n.d.(b)) to stabilize and conserve the Sargent Farmhouse in its current location until the proposed development is initiated.

2 Heritage Conservation Plan (HCP)

- Prepare a Heritage Conservation Plan (HCP) detailing how the heritage attributes of the farmhouse will be conserved, protected, and enhanced, and how the preferred conservation approach will be implemented (i.e. dismantling and reconstruction, or dismantling and reuse), that balances the objectives of heritage conservation with economic and social sustainability.
- The HCP should also include required actions and trades depending on approach, and an implementation schedule to conserve the farmhouse prior to, during, and after the dismantling and reconstruction effort.

3 Documentation and Salvage Report

- Document the farmhouse through a Documentation and Salvage Report in accordance with the *Brampton Documentation and Salvage Plan Terms of Reference* (Brampton, n.d. (a)) including measured drawings, rectified photography, and written notes prior to undertaking any intervention beyond minor stabilization or maintenance.



- Prepare a Commemoration Plan in accordance with *Brampton Heritage Commemoration Plan Terms of Reference* (Brampton, 2022) including recommendation to address interpretative challenges with the re-envisioned Sargent Farmhouse.

MEDIUM-TERM CONSERVATION ACTIONS (CONSTRUCTION PHASE):

- If the farmhouse is not disassembled at the initiation of the construction phase, manage fugitive dust emissions
 - Draft a fugitive dust emissions plan following practices outlined in the *Ontario Standards Development Branch Technical Bulletin: Management Approaches for Industrial Fugitive Dust Sources* (2017).
- If the farmhouse is not disassembled at the initiation of the construction phase, engage a qualified vibration specialist to determine if the Sargent Farmhouse will be impacted by vibrations and whether any mitigation measures are necessary.

LONG-TERM CONSERVATION ACTIONS

- Implement the commemorative plan which could include a commemorative plaque on the new parcel in a location and manner that will be visible from public rights of way but will not impact the reconsolidated heritage attributes of the building.

7 CLOSURE

We trust that the information presented in this memo meets your current requirements. Should you have any questions, or concerns, please do not hesitate to contact the undersigned.

WSP Canada Inc.

Prepared by:

Chelsey Collins (Tyers), BES, MCIP, RPP
Cultural Heritage Specialist
chelsey.tyers@wsp.com

Reviewed by:

Kanika Kaushal, B.Arch., M.Arch., CAHP, APT, Intern
Architect, MRAIC
Senior Cultural Heritage Specialist
kanika.kaushal@wsp.com

Heidi Schopf, MES, CAHP
Cultural Heritage Team Lead
heidy.schopf@wsp.com



8 SOURCES CITED

Brampton, City of, 2022. Brampton Heritage Commemoration Plan Terms of Reference. Retrieved from: <https://pub-brampton.escribemeetings.com/filestream.ashx?DocumentId=69660>

Brampton, City of, 2000. City of Brampton Official Plan 2006. September 2020 Consolidation. Retrieved from: https://www.brampton.ca/EN/City-Hall/Official-Plan/Documents/Sept2020_Consolidated_OP_2006.pdf

Brampton, City of, n.d. (a). Brampton Documentation and Salvage Plan Terms of Reference. Retrieved from: <https://pub-brampton.escribemeetings.com/filestream.ashx?DocumentId=93138>

Brampton, City of, n.d. (b). Heritage Building Protection Plan: Terms of Reference. Retrieved from: https://www.brampton.ca/EN/Arts-Culture-Tourism/Cultural-Heritage/Documents/HBPP_Terms_of_Reference_FINAL.pdf

ICOMOS Canada. Appleton Charter for the Protection and Enhancement of the Built Environment. <https://www.icomos.org/images/DOCUMENTS/Charters/appleton.pdf>

Jerome, Pamela, 2008. An Introduction to Authenticity in Preservation. *APT Bulletin: Journal of Preservation Technology*. 39:2-3. Retrieved from: <https://www.apti.org/assets/docs/JeromePamela-39-2-3.pdf>

Kalman, Harold and Marcus Létourneau, 2020. *Heritage Planning: Principles and Process*. Routledge, New York.

Ministry of Multiculturalism and Citizenship (MCM), 2022. Eight guiding principles in the conservation of built heritage properties. Retrieved from: <https://www.ontario.ca/page/eight-guiding-principles-conservation-built-heritage-properties>

New Zealand Transport Agency, 2015. *Historic Heritage Impact Assessment Guide for State Highway Projects*. New Zealand Government, Wellington.

Ontario Standards Development Branch, 2017. *Technical Bulletin: Management Approaches for Industrial Fugitive Dust Sources*. <https://files.ontario.ca/management-approaches-for-industrial-fugitive-dust-sources.pdf>

Parks Canada Agency, 2010. *Standards and Guidelines for Historic Places In Canada*. <https://www.historicplaces.ca/en/pages/standards-normes>

Sprinkle, John R., 2014 *Crafting Preservation Criteria: The National Register of Historic Places and American Historic Preservation*. Routledge, New York.



Appendix A

**11185 Airport Road, Structural Condition Assessment,
Tacoma Engineers, March 21, 2024**

11185 Airport Road Structural Condition Assessment

11185 Airport Road
Brampton Ontario



Prepared by:



176 Speedvale Avenue West
Guelph, ON
TE-43401-24

March 21, 2024

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1. Introduction

Tacoma Engineers has been retained by Opal Valley Developments Inc. to carry out a structural condition assessment of an existing two-storey residential building located at 11185 Airport Road in Brampton. The undersigned attended the site on March 4th, 2024, accompanied by representatives of Opal Valley Developments.

This report includes a summary of the following items for the building:

- major structural systems;
- existing structural conditions and areas of potential concern; and
- structural commentary and recommendations related to future development plans.

2. Background and Building History

This assessment is being undertaken for Opal Valley Developments Inc. and is intended to form part of the preparation work for a new development on the property. It is understood that the building cannot remain in its current location due to interference with the proposed development layout. The primary purpose of this assessment is to review the structural condition of the building as it relates to the feasibility of relocation.

The two-storey residential dwelling at 11185 Airport Road is constructed of multi-wythe brick, complete with wood-framed roof, floors, and partition walls. The building is constructed on rubble-stone foundations, with triple-wythe ground floor walls and double-wythe second floor walls. It measures approximately 88m² in building area with a summer kitchen on the rear, measuring approximately 34m² in building area (122m² total). For the purpose of this report, the west elevation of the building is assumed to face Airport Road.

No previous work has been completed by Tacoma Engineers on this building for this or any other owner.

3. Scope and Methods

This report is based on a visual inspection only and does not include any destructive testing. Where no concerns were noted, the structure is assumed to be performing adequately. No further structural analysis or building code analysis has been carried out as part of this report unless specifically noted.

Note that most of the spaces in the building have applied finishes that preclude a direct visual assessment of the structural systems. Limited areas are unfinished, and a review of the primary structure was possible in these areas.

A visual review of all accessible spaces was completed on March 4th, 2024, and photographs were taken of all noted deficiencies.

4. Definitions

The following is a summary of definitions of terms used in this report describing the condition of the structure as well as recommended remedial actions.

- **Condition States¹:**

1. Excellent – Element(s) in “new” condition. No visible deterioration type defects present, and remedial action is not required.
2. Good – Element(s) where the first signs of minor defects are visible. These types of defects would not normally trigger remedial action since the overall performance is not affected.
3. Fair – Element(s) where medium defects are visible. These types of defects may trigger a “preventative maintenance” type of remedial action where it is economical to do so.
4. Poor – Element(s) where severe or very severe defects are visible. These types of defects would normally trigger rehabilitation or replacement if the extent and location affect the overall performance of that element.

In addition to the definitions listed above, it should be noted that the building in question is listed on the municipal heritage register. The Standards and Guidelines for the Conservation of Historic Places in Canada provide direction when a structural system is identified as a character-defining element of an historic place. They also provide direction on maintaining, repairing, and replacing structural components or systems². Refer to the General Guidelines for Preservation, Rehabilitation, and Restoration to further inform the development of more detailed remedial actions.

¹ Adapted from “Structural Condition Assessment”, 2005, American Society of Civil Engineers/Structural Engineering Institute

² “Standards and Guidelines for the Conservation of Historic Places in Canada”, 2nd Edition, 2010, www.historicplaces.ca

5. General Structural Conditions

The building is constructed as a one and a half-storey masonry and wood-framed structure. Exterior walls are constructed with multi-wythe brick, and the roof, floors, and partition walls are constructed with wood framing.

For clarity, this report has been arranged by floor, with specific attention called to rooms or areas where deficiencies were noted.

5.1. Second Floor

Construction

The construction of the second floor consists of:

- 4"x6" roof rafters at 16" on centre spanning east-west between exterior walls.
- 2"x6" raised ceiling joists at 16" on centre spanning east-west, hung from the rafters at the ridgeline by 1"x3" boards.
- Wood framed partition walls with lathe and plaster finish.
- Double-wythe brick exterior walls with direct applied plaster finish.

Steel tension rods are present approximately 8-10" above finished floor elevation spanning between plates on the outside of the exterior walls.

Conditions

The second floor and attic were generally in fair condition, with damage to localized areas of finishes on the walls.

The exception was a significant horizontal (out of plane) deflection in the south wall, both along the height and length of the wall. A deflection of approximately 2-3" was measured at mid-length of the wall near the finished floor elevation. Refer to Photograph 1a and 1b for the relative deflection based on the offset of the wall to the tension rod.



Photograph 1a & b: Relative deflection of wall based on offset from tension rod

Refer to Section 5.2 Ground Floor and Section 5.5 Exterior for further discussion on the condition of the south wall.

5.2. Ground Floor

Construction

The construction of the ground floor consists of:

- 2-1/2"x10" floor joists at 16" on centre spanning north-south between exterior walls and interior loadbearing walls.
- Wood framed partition walls with lathe and plaster finish.
- Triple-wythe brick exterior walls with direct applied plaster finish.

Conditions

The ground floor was generally in fair condition, with damage to localized areas of finishes and separation of joints in the trim around select wall openings.

A section of ceiling finishes was removed at the southwest corner of the building and approximately at the middle of the south wall (refer to Photograph 2). Due to the absence of damage or evidence of movement, it is unlikely that the deflection on the second floor was caused by an outward movement of the wall after construction. It is assumed that the wall was built out of plumb. Refer to Section 5.5 Exterior for further discussion on the condition of the south wall.



Photograph 2: Section of removed ceiling finishes at the middle of the south wall

A significant slope of the ground floor structure was also noted throughout. The slope is indicative of differential settlement between the interior and exterior bearing walls.

5.3. Basement

Construction

The basement is located below the south half of the home. Its construction consists of:

- 4"x10" floor joists at 24" on centre spanning north-south between exterior foundation walls and an interior foundation wall.
- 16" thick rubble stone foundation walls with localized areas covered in parging.
- Dirt floor with areas of roughly poured concrete.

Wood shoring posts had been installed in localized areas below individual floor joists.

The north half of the home and summer kitchen are built above shallow crawl spaces with joists spanning in the north-south direction.

Conditions

The basement was generally in fair condition. A notched joist was noted behind the furnace (Photograph 3), and the foundation wall was undermined in a localized area where a water supply pipe enters the building on the west wall (Photograph 4). The foundation walls also exhibit signs of deterioration due to moisture.

One shoring post was installed to support a cut joist, and others to support other localized areas of floor. It is unlikely that the shoring posts bear on footings.



Photograph 3: Notched joist behind furnace



Photograph 4: Undermined section of foundation wall

5.4. Summer Kitchen

Construction

The construction of the summer kitchen consists of:

- 4"x6" roof rafters at 36" on centre spanning north-south between exterior walls.
- 2"x6" ceiling joists at 16" on centre spanning north-south between exterior walls.
- 8" round heavy timber floor joists spanning north-south.
- Multi-wythe brick exterior walls.

Conditions

The finishes in the summer kitchen were generally of poor quality and/or in poor condition. Water damage was noted to the ceiling and floor finishes, as seen in Photograph 5 and 6, which could pose a larger concern to the underlying structure.



Photograph 5: Water damage to ceiling finishes



Photograph 6: Water damage to floor finishes

5.5. Exterior

Construction

The exterior of the building is constructed of multi-wythe brick. The bricks of the main portion of the building are not cut where the summer kitchen connects; however, the walls do terminate, suggesting that the summer kitchen may be original to the home. The summer kitchen walls are inserted into the main building walls; however, they are not keyed in nor do the courses align.

Steel tension rods are installed below the soffit height at each corner in the main portion of the building. The tension rods are oriented in both directions.

Conditions

The deflection noted on the interior of the south wall was also apparent from the exterior, along with deflections to the west and north elevations. Cracks and displacement of bricks were also visible at the corners of each wall where the accent masonry had pulled away from the surrounding masonry, as seen in Photograph 7. Some cracks extended well into the surrounding masonry. The tension rods appeared to be installed to restrain this outward movement; however, their effectiveness is unclear.

Deterioration was noted on each elevation below windows, consistent with damage from water ingress. Diagonal cracks were also noted extending upward from the top corners of windows. Loose or damaged bricks were present in the jack arches above windows at several locations. Several failed repairs were evident, many with non-compatible materials. The typical condition of the walls can be seen in Photograph 8. Inconsistent coursing was also noted on the south elevation, as seen in Photograph 9, which does not appear to be due to movement, rather it appears to have been constructed this way.

Areas were noted throughout the walls where past repairs had been made to larger openings by filling the holes with large amounts of mortar and cutoffs from brick (Photograph 10).

The roof rafters had notable deflections, and the chimney above the roof line had several loose and spalled bricks, as visible in Photograph 11. The loose bricks at the chimney and jack arches pose a safety concern from falling material.



Photograph 7: Cracks and displacement at accent masonry



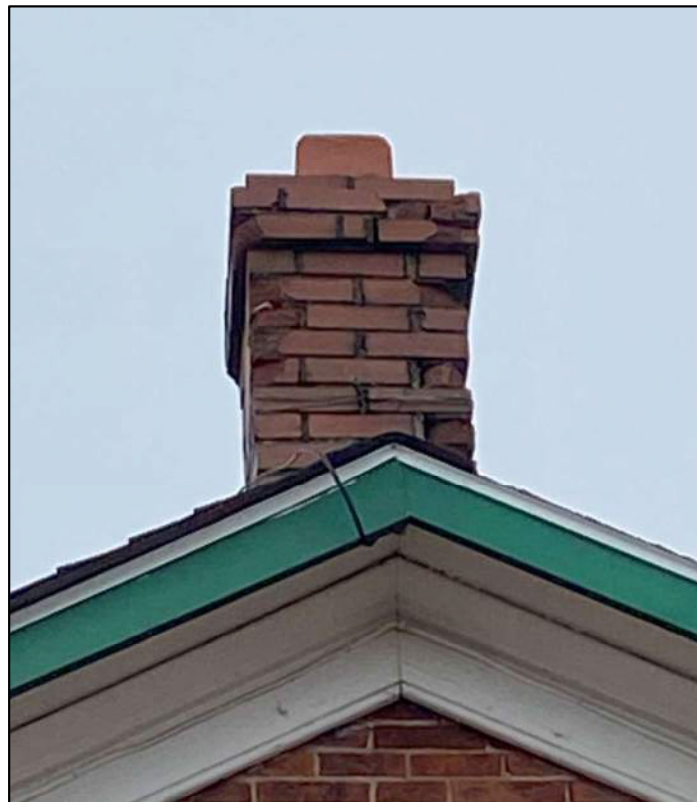
Photograph 8: Typical condition of exterior walls



Photograph 9: Inconsistent coursing



Photograph 10: Repair of past holes



Photograph 11: Condition of chimney

6. Relocation Feasibility

Tacoma Engineers was asked to review the relocation feasibility of the house at 11185 Airport Road with respect to the suitability of the structural elements only.

The summer kitchen walls are not suitably tied-in to the main portion of the building. This creates a weak point during relocation which could result in differential movement or separation of the two parts of the building.

The irregular and out of plane masonry walls – in combination with the displaced bricks, cracked joints at the corners of the building, and the inconsistent coursing – creates an unstable condition under the loads from relocation which the building is not typically subjected to. The south wall would likely require a full replacement, and the step cracks on the north and east walls would require extensive restoration before the structure would be in suitable condition to relocate, including rebedding a large number of the bricks.

Loose material at the jack arches and chimney, along with several cracks and poor repairs increase the risk of instability during a relocation attempt. The extent of restoration required would adversely affect a significant volume of the historic fabric. These repairs would be in addition to the bracing and stabilization work required during a relocation attempt.

The sloping floor is indicative of differential settlement between the interior and exterior bearing walls. By relocating the building to a new foundation, only partial recovery of the slope could be achieved. Constructing the new foundations with a varying height is impractical and would pose a challenge to relocating the building.

Due to the instability of the building and the extent of repair required, the building at 11185 Airport Road is not a good candidate for relocation.

7. Conclusions

In general, the interior of the building is in fair condition. The exterior of the building is generally in poor condition. Due to the deficiencies noted, the additional loads and deflections imposed during a relocation attempt would have critical impacts to the overall stability of the structure. The extent of repair required to stabilize the structure would be both uneconomical and adversely affect a significant volume of the historic fabric of the building. The building at 11185 Airport Road is not a good candidate for relocation.

Please contact the undersigned with any further questions or comments.

Per



Andrew Watson, EIT
Structural Designer
Tacoma Engineers

Will Teron, P.Eng., CAHP
Director – Heritage & Investigation, Principal
Tacoma Engineers





Appendix B

**Email Correspondence from Tacoma Engineers
regarding brick salvage**

From: Will Teron <willt@tacomaengineers.com>

Sent: Tuesday, July 16, 2024 9:35 AM

To: Tony Priori <tonyp@northstarhomesinc.com>

Cc: Collins, Chelsey <Chelsey.Tyers@wsp.com>; Maria Jones <maria@candevcon.com>; Frank <frankd@northstarhomesinc.com>; Daniel <danielt@northstarhomesinc.com>

Subject: RE: Opal Valley Developments 11185 Airport Road HIA Addendum

Based on our review in March, we would estimate a salvage rate between 60-70%. This is based on the condition of the exterior wythe brick. We could not assess the interior wythe brick – condition nor suitability for exterior exposure. Not all interior brick was fired such that it can be used as exterior brick. To further compound the challenge of re-bricking the house is the two colours. The interior brick is likely red so in the end you may have a shortage of yellow brick. As you suggest, you will only know the final quantity of brick available after deconstruction and salvage work is complete.

Will Teron, P.Eng., FEC, CAHP

Director - Heritage & Investigation, Principal

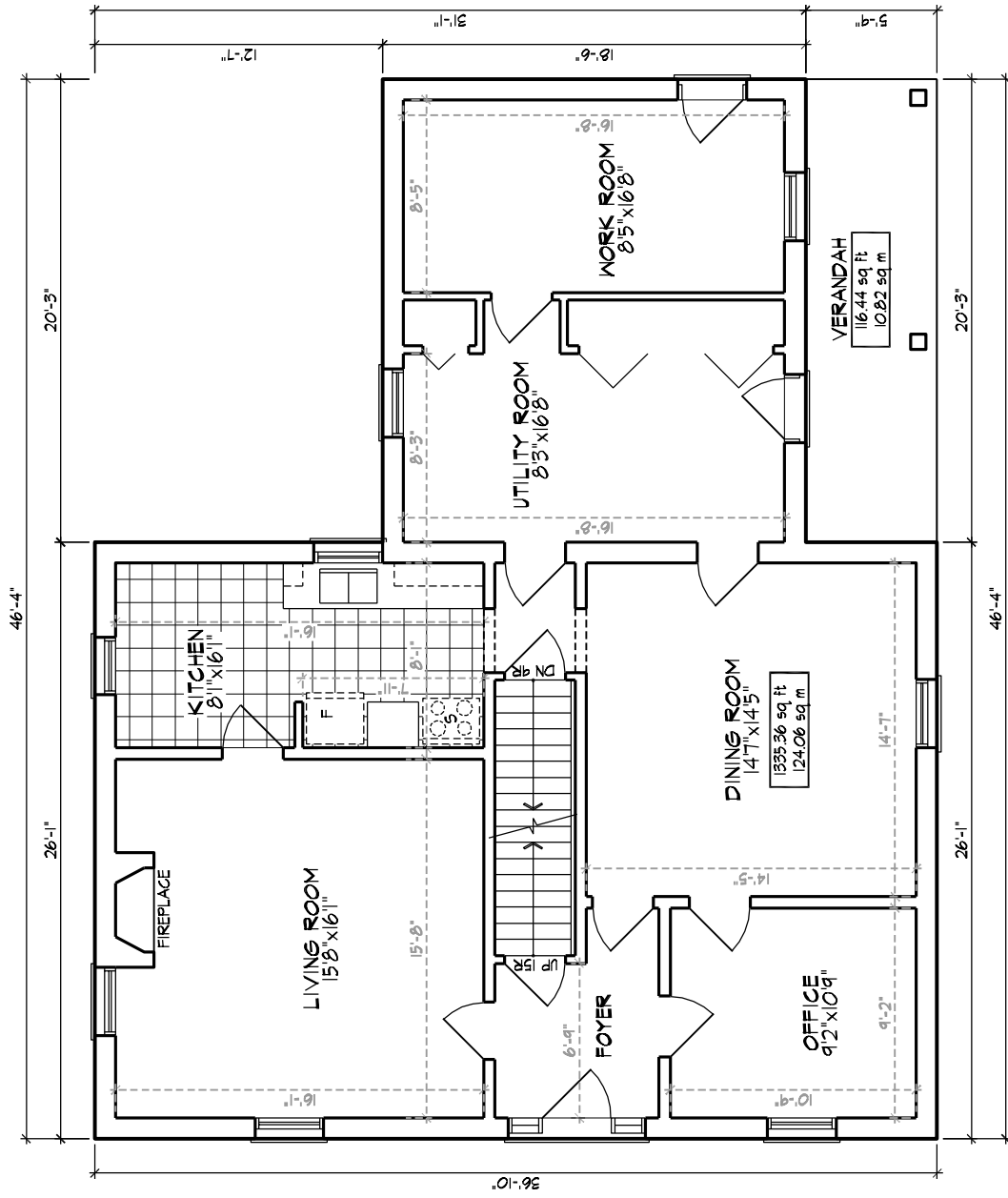
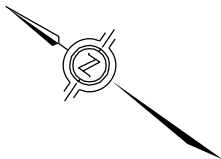
TACOMA ENGINEERS EXPERIENCE TRUST

[519-763-2000 x219](tel:519-763-2000) | [519-837-5910 \(mobile\)](tel:519-837-5910)



Appendix C

Existing Floor Plans and Elevations for the Sargent Farmhouse



EXISTING GROUND FLOOR PLAN

1335 sq ft
 COVERAGE W/O PORCH 1335 sq ft
 COVERAGE W/ PORCH 1452 sq ft

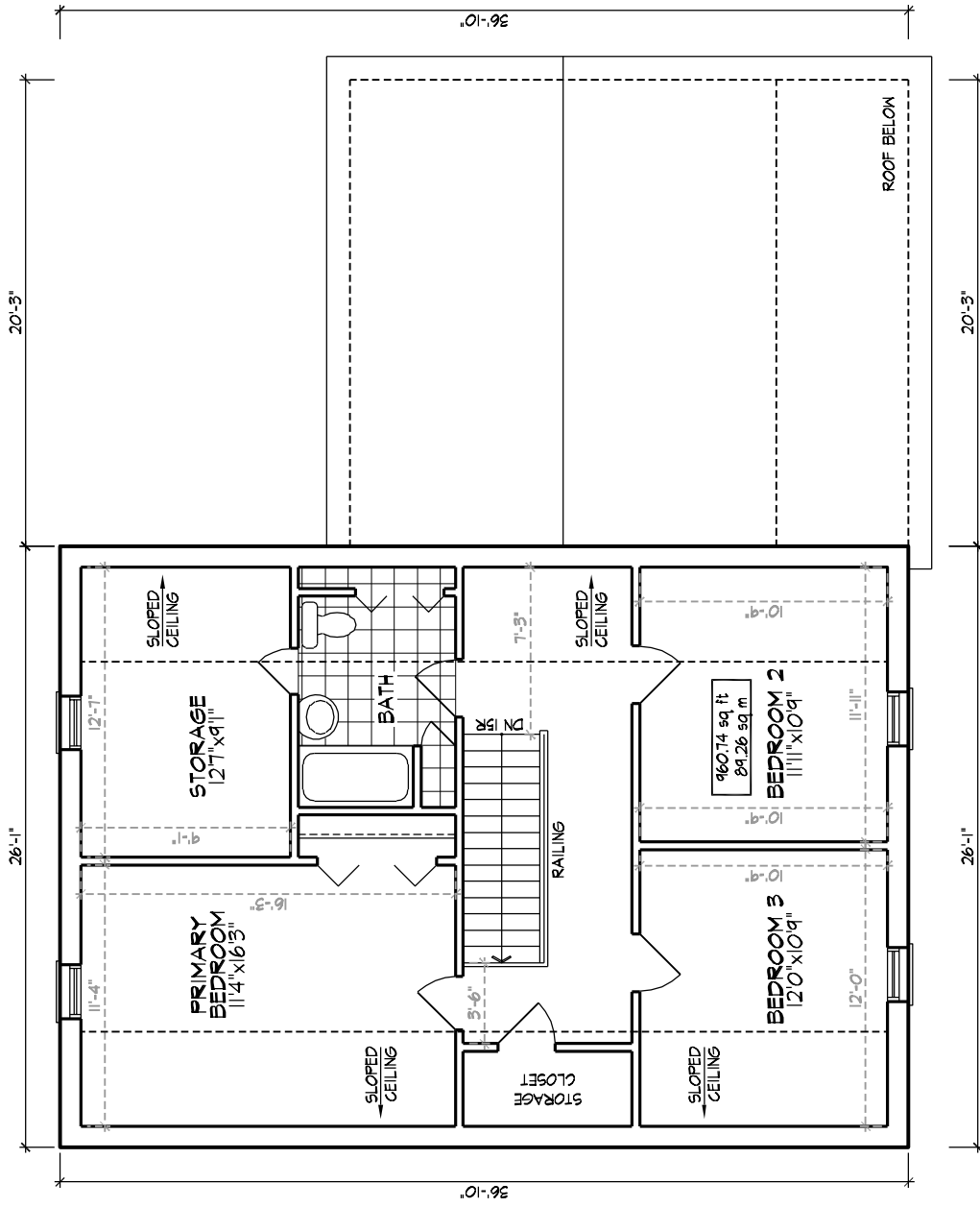


OPAL VALLEY DEVELOPMENTS #224002

11185 AIRPORT ROAD, BRAMPTON, ON
 8966 Woodbine Ave, Markham, ON L3R 0J7 ■ T 905.737.5133 ■ APR. 2024 ■ MA

ALL DIMENSIONS MUST BE VERIFIED BY THE BUILDER (TYP)

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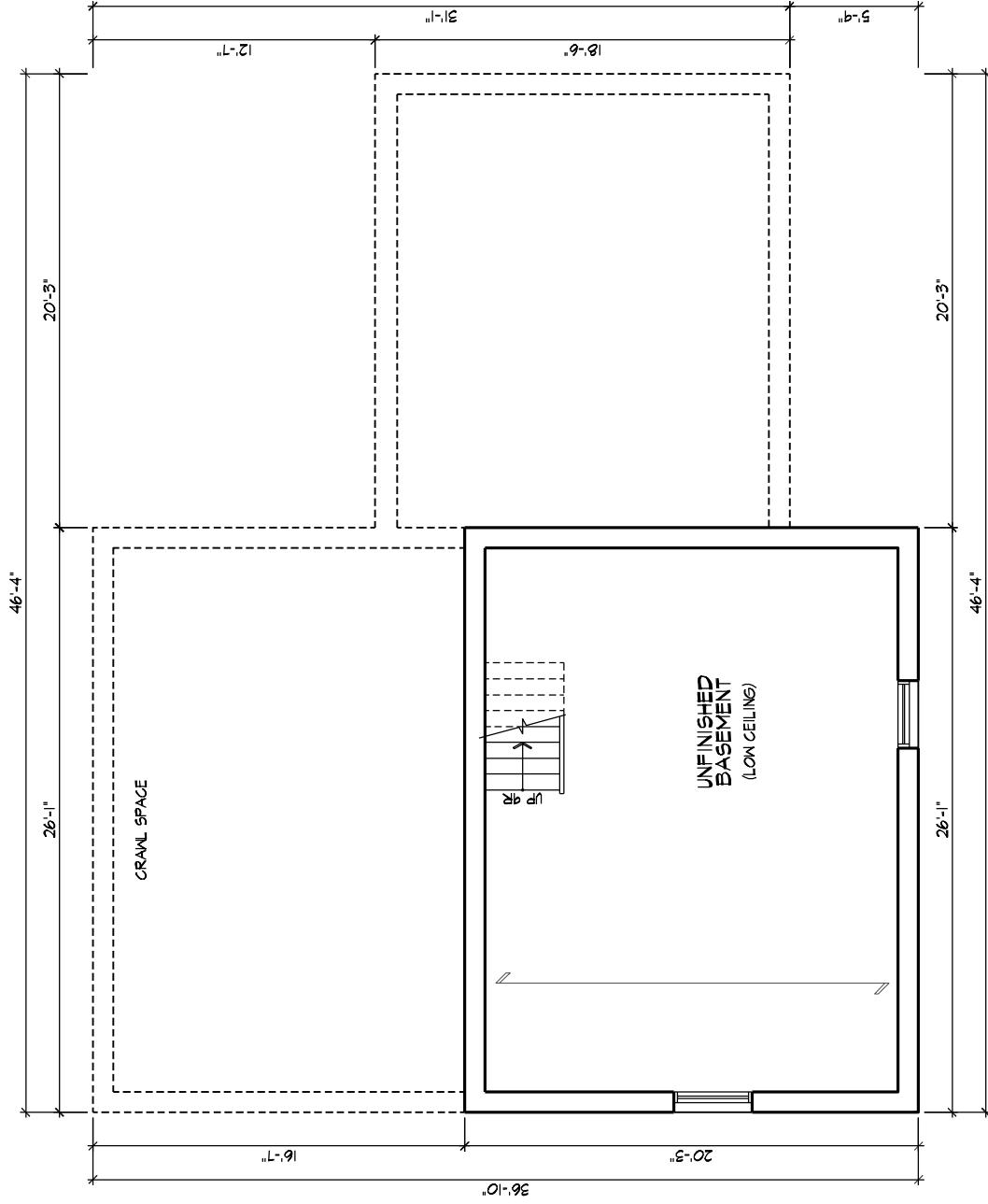


EXISTING SECOND FLOOR PLAN

461 sq ft	461 sq ft
GROSS FLOOR AREA	DEDUCT OPEN AREAS
0.00 sq ft	NET AREA



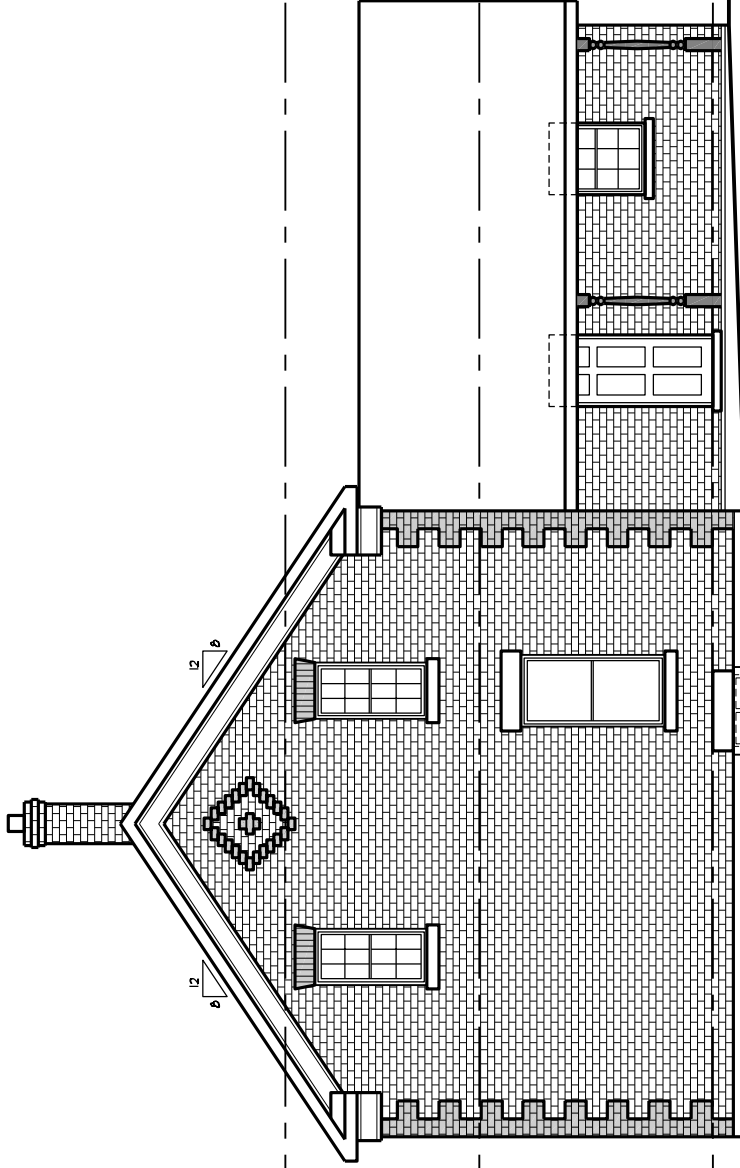
OPAL VALLEY DEVELOPMENTS #224002
 11185 AIRPORT ROAD, BRAMPTON, ON
 8966 Woodbine Ave, Markham, ON L3R 0J7



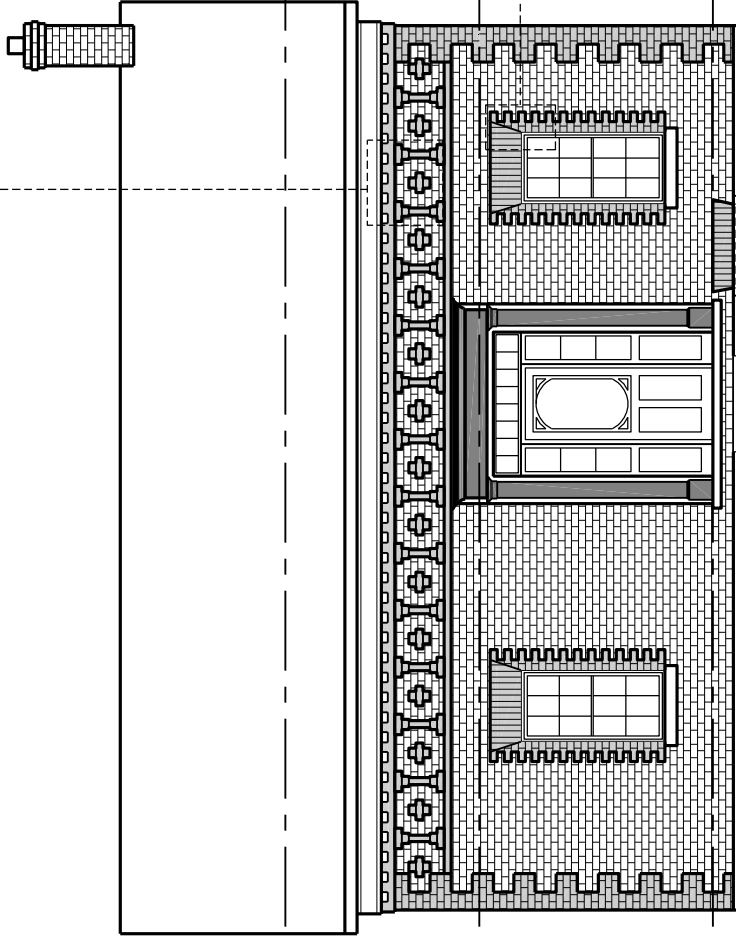
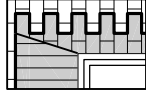
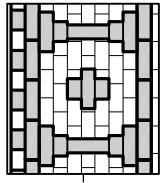
EXISTING BASEMENT PLAN
0 sq ft



OPAL VALLEY DEVELOPMENTS #224002
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EXISTING SOUTH ELEVATION

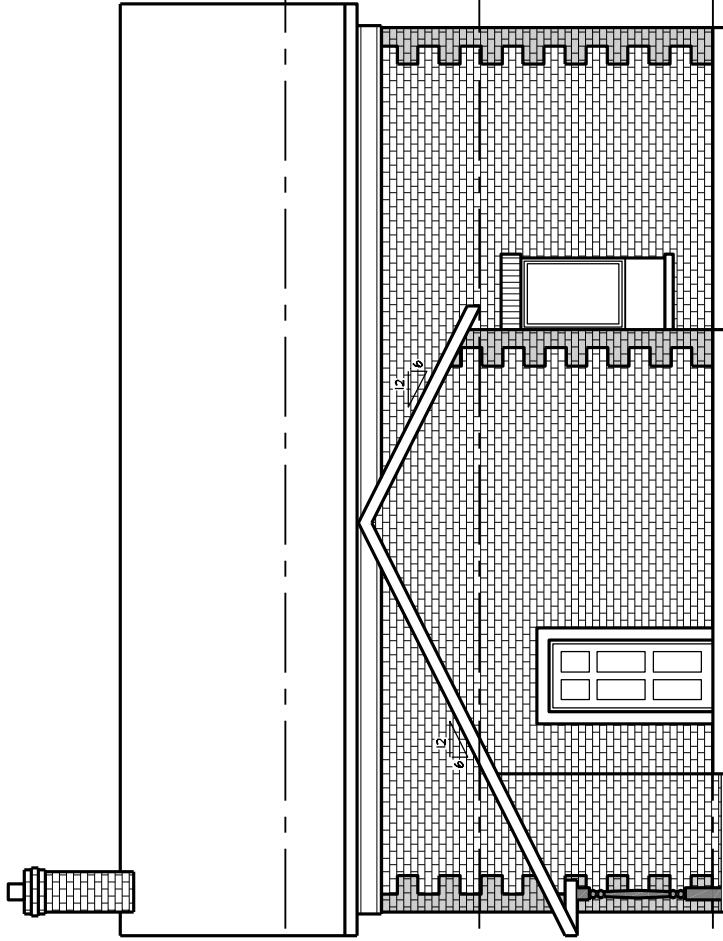


EXISTING WEST ELEVATION

NOTE: SHADED BRICKS SHOWN ARE THE BUFF COLOURED BRICKS. THE REST ARE THE RED BRICKS

BRICK COUNT
(APPROXIMATE)

	BUFF BRICK	RED BRICK
EXISTING NORTH ELEV.	57.09 S.F. ±343 Bricks	585.88 S.S.F. ±
EXISTING EAST ELEV.	43.44 S.F. ±261 Bricks	428.71 S.S.F. ±
EXISTING WEST ELEV.	108.21 S.F. ±649 Bricks	343.56 S.S.F. ±
EXISTING SOUTH ELEV.	40.85 S.F. ±244 Bricks	584.14 S.S.F. ±
TOTAL	249.59 S.F. ±1497 Bricks	1942.09 S.S.F. ±



EXISTING EAST ELEVATION



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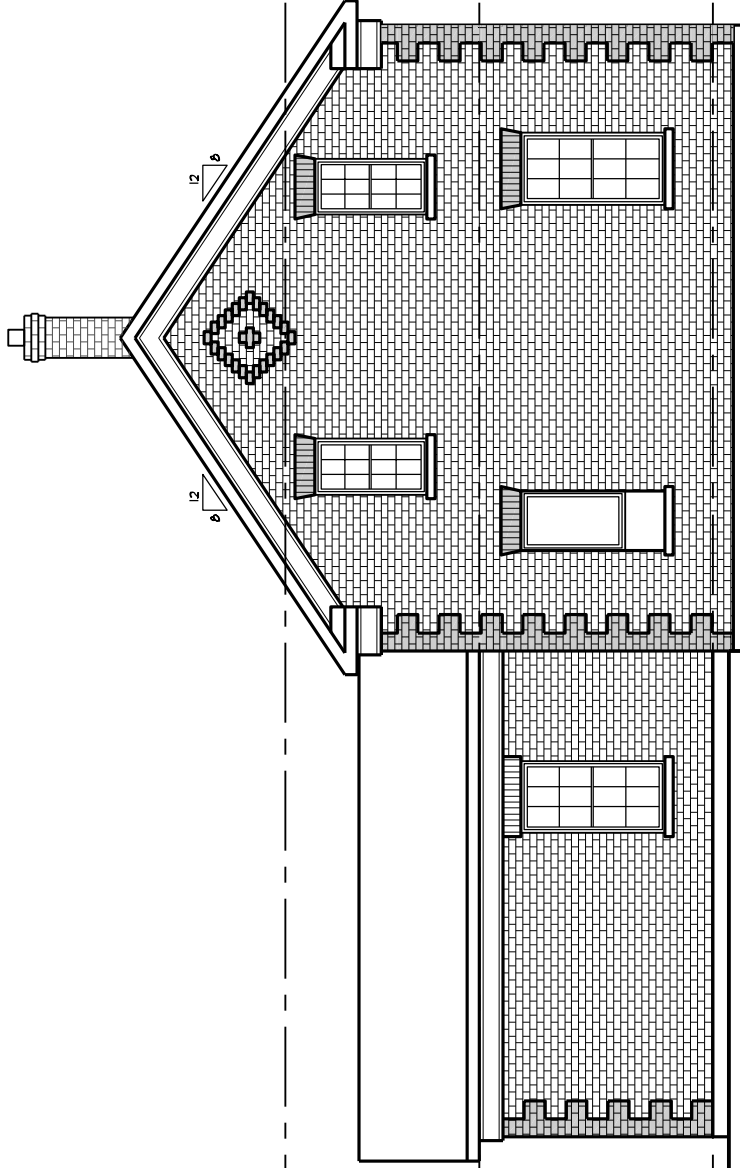
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APR. 2024

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EXISTING NORTH ELEVATION



Appendix D

**Site Plan, Floor Plan and Elevations
for Proposed Dwelling on Lot 8**

AIRPORT ROAD

N45°23'20"W (P&M)

56.31m

BLOCK 2
4.5m NOISE
BUFFER

West Section - only this section to
receive salvaged bricks

salvaged
brick
storage

LAUDERHILL ROAD

R=19.5m

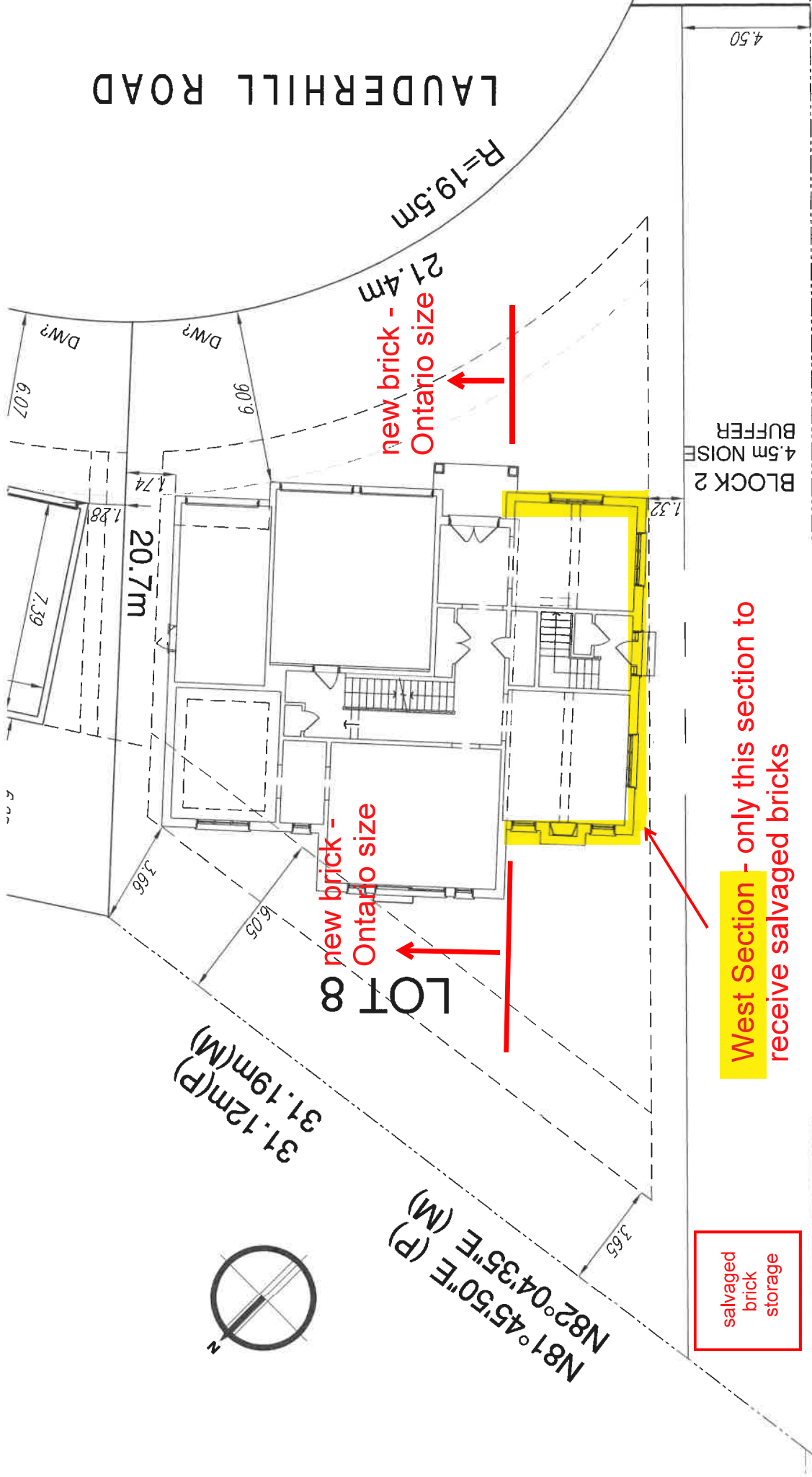
new brick -
Ontario size

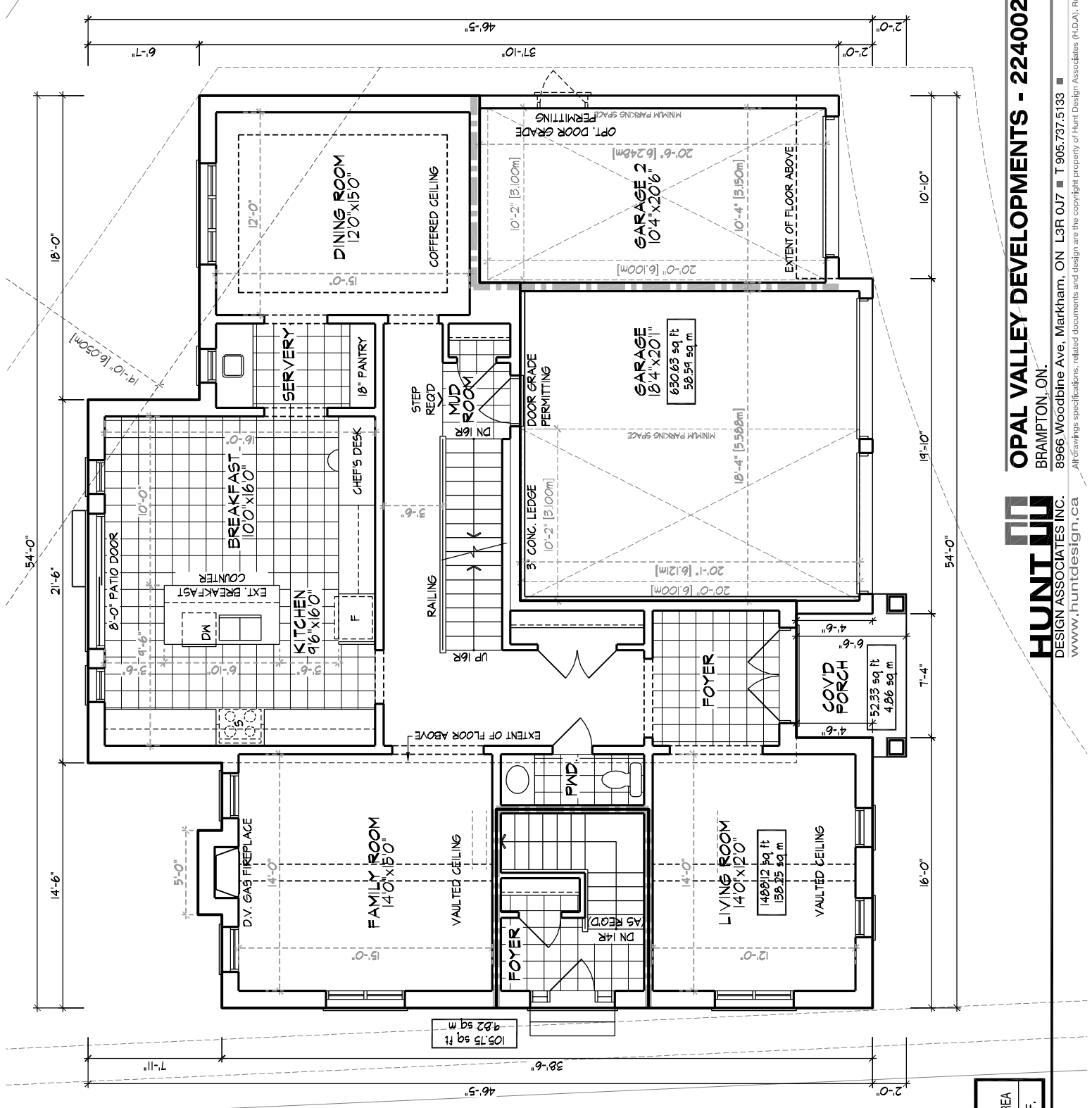
new brick -
Ontario size

LOT 8

31.12m(P)
31.19m(M)

N81°45'50"E (P)
N82°04'35"E (M)





GROUND FLOOR PLAN

MAIN SUITE	BSMT. SUITE
EL. #	1488 S.F.
	106 S.F.

GROUND FLOOR PLAN

1544 sq ft
COVERED W/O PORCH
COVERED W/ PORCH
2226
2276

9'-0" CEILING

FC

Z
MAY
MAY
MAY
MAY
MAY
MAY
MIN
MAY
MAY
MAY

BSMT. SUITE	TOTAL AREA
1436 S.F.	4594 S.F.

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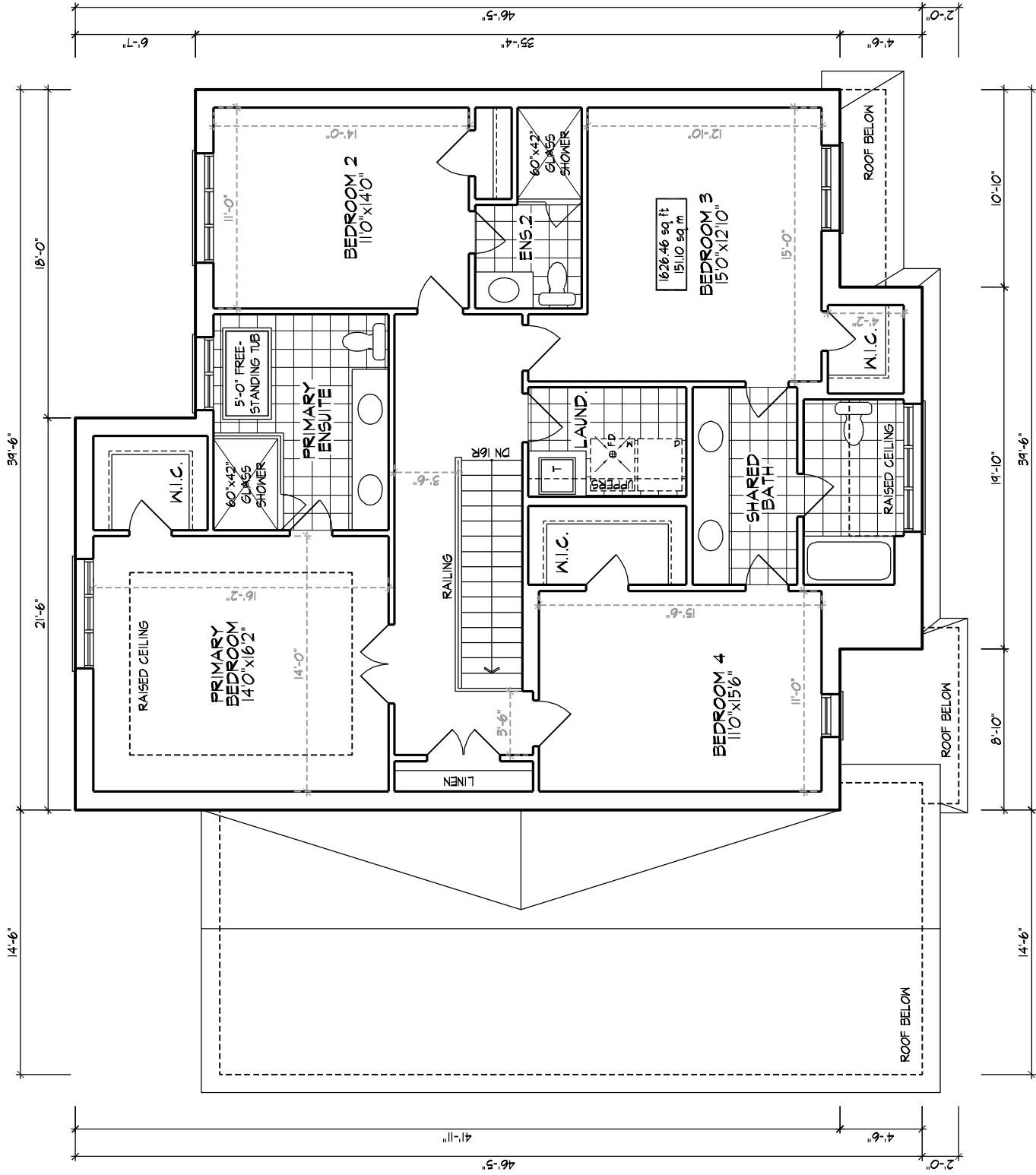
JAN. 2024

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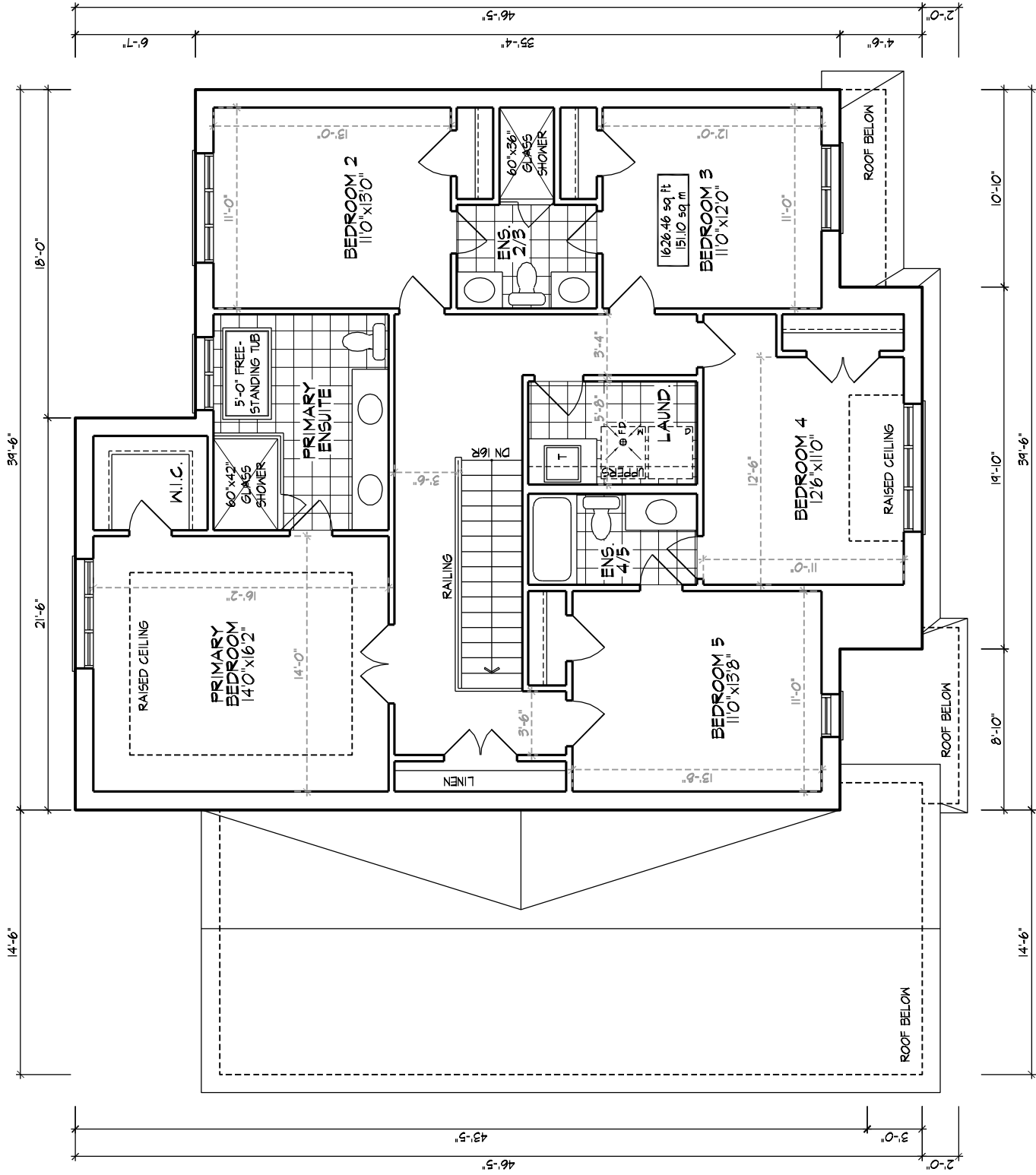
SECOND FLOOR PL
 1626 sq. ft.
 GROSS FLOOR AREA
 DEDUCT OPEN AREAS
 NET AREA

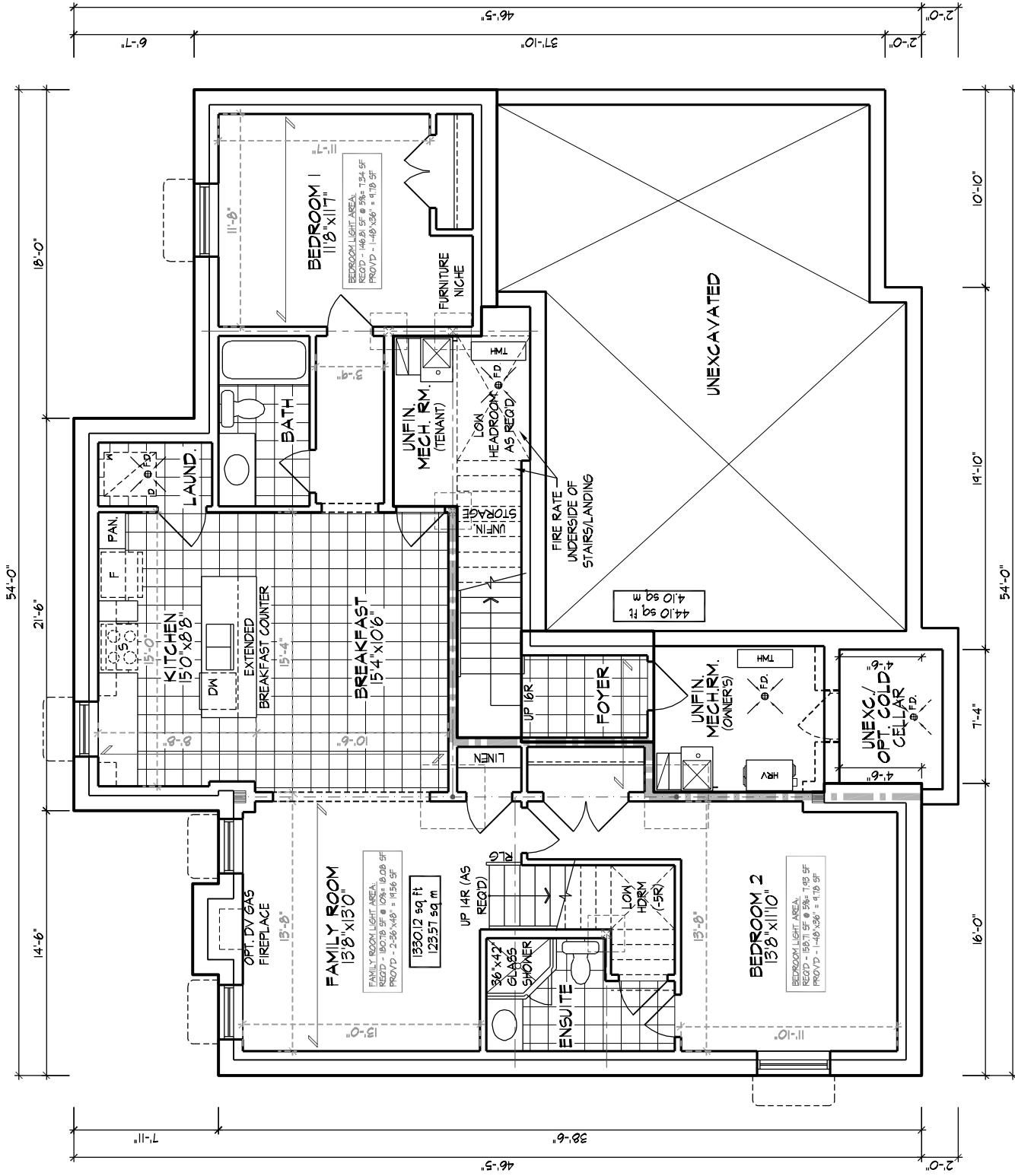
9'-0" CEILING

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BASEMENT PLAN	
MAIN SUITE	BSMT. SUITE
EL. 'A'	44 S.F.
	1330 S.F.

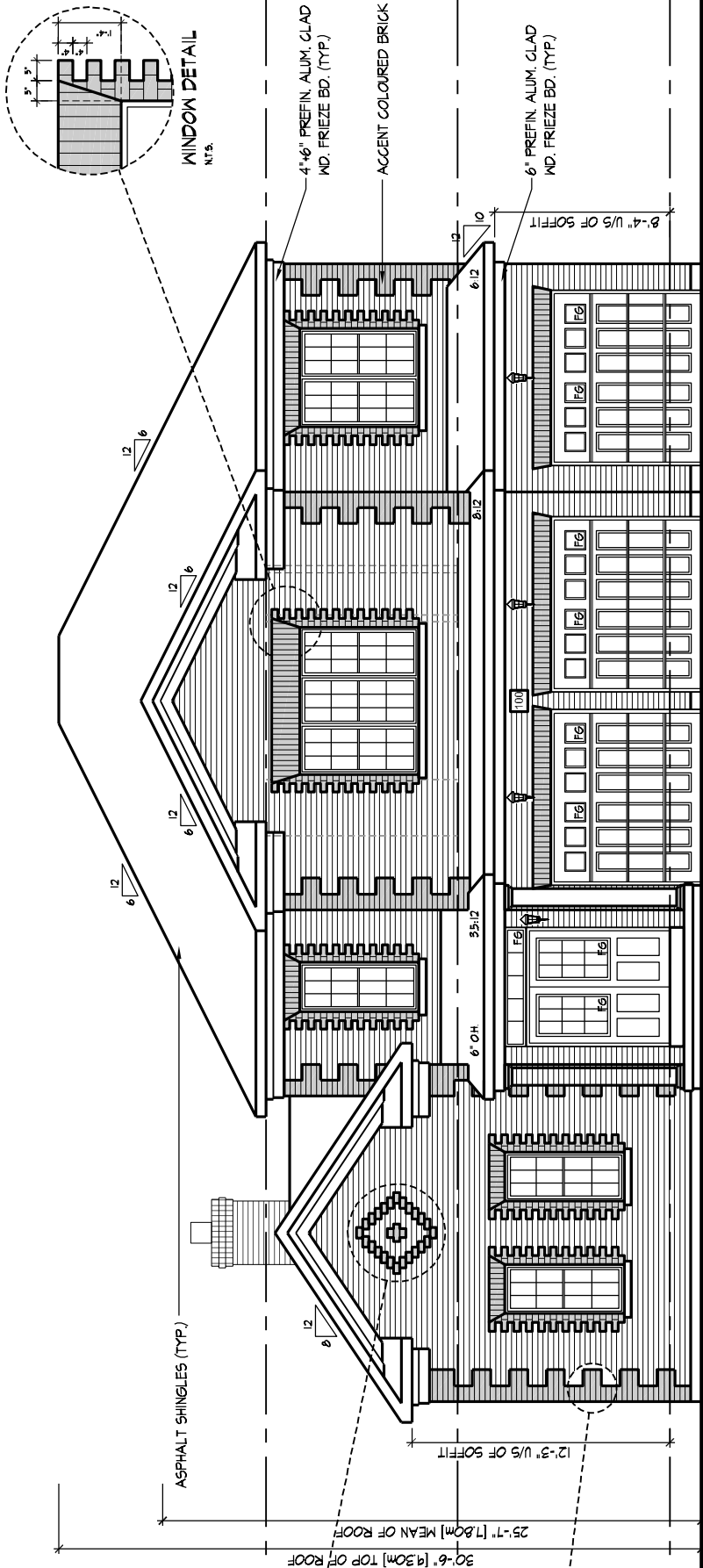
BASEMENT PLAN, E.I.
1574 sq ft

OPAL VALLEY DEVELOPMENTS - 224002
BRAMPTON, ON.

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SOUTH/FRONT ELEVATION 'A'

Item	manufacturer	product	colour
New Brick	Brampton Brick	Arch.Series Modular	Red & Buff (Velour)
Shingles	IKO Cambridge	Lifetime laminated	Harvard Slate
Aluminum Goods	Kaycan	Trough/facia/dwnpipe	White
Window Frames	Jeldwen	Vinyl	White
Painted elements	Benjamin Moore	Exterior semi-glass	Cloud White OC-130

 BUFF COLOUR MASONRY
 RED COLOUR MASONRY

NOTE: REISE AS MANY EX
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OPAL VALLEY DEVELOPMENTS - 224002

BRAMPTON, ON.

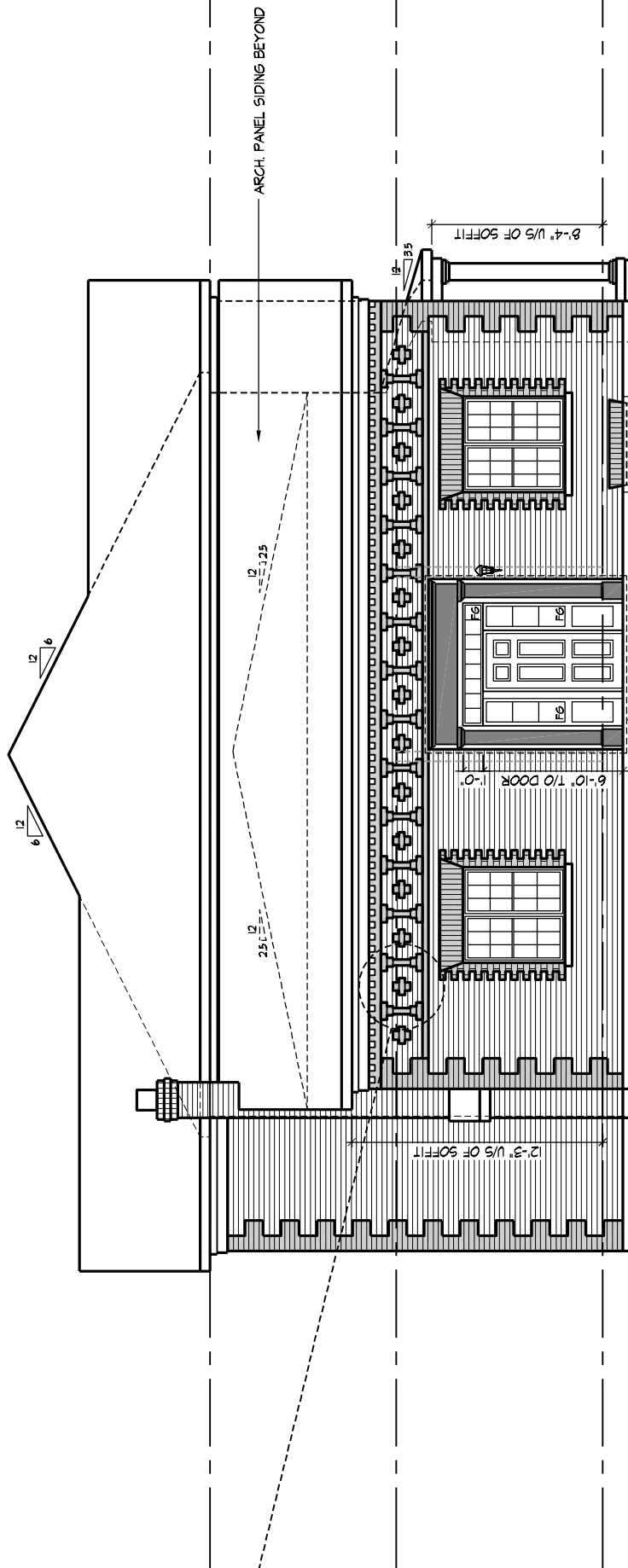
8966 Woodbine Ave, Markham, ON L3R 0J7 ■ T 905.737.5133 ■

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WEST/LEFT SIDE ELEVATION 'A'

EXTENTS OF SPATIAL CALCULATIONS. REFER TO WINDOW SUMMARY FOR ADDITIONAL INFORMATION

NOTE: ENTRY TO BE MODELLED AFTER EXISTING HOUSE WITH NEW MATERIALS.

BUFF COLOUR MASONRY
 RED COLOUR MASONRY

NOTE: REUSE AS MANY EXISTING MATERIALS AS POSSIBLE. REPAIR AND REFINISHING OF THE PROPOSED MASONRY TO BE VERIFIED AND APPROVED BY THE ARCHITECT. MORTAR TO BE MATCHED TO EXISTING.

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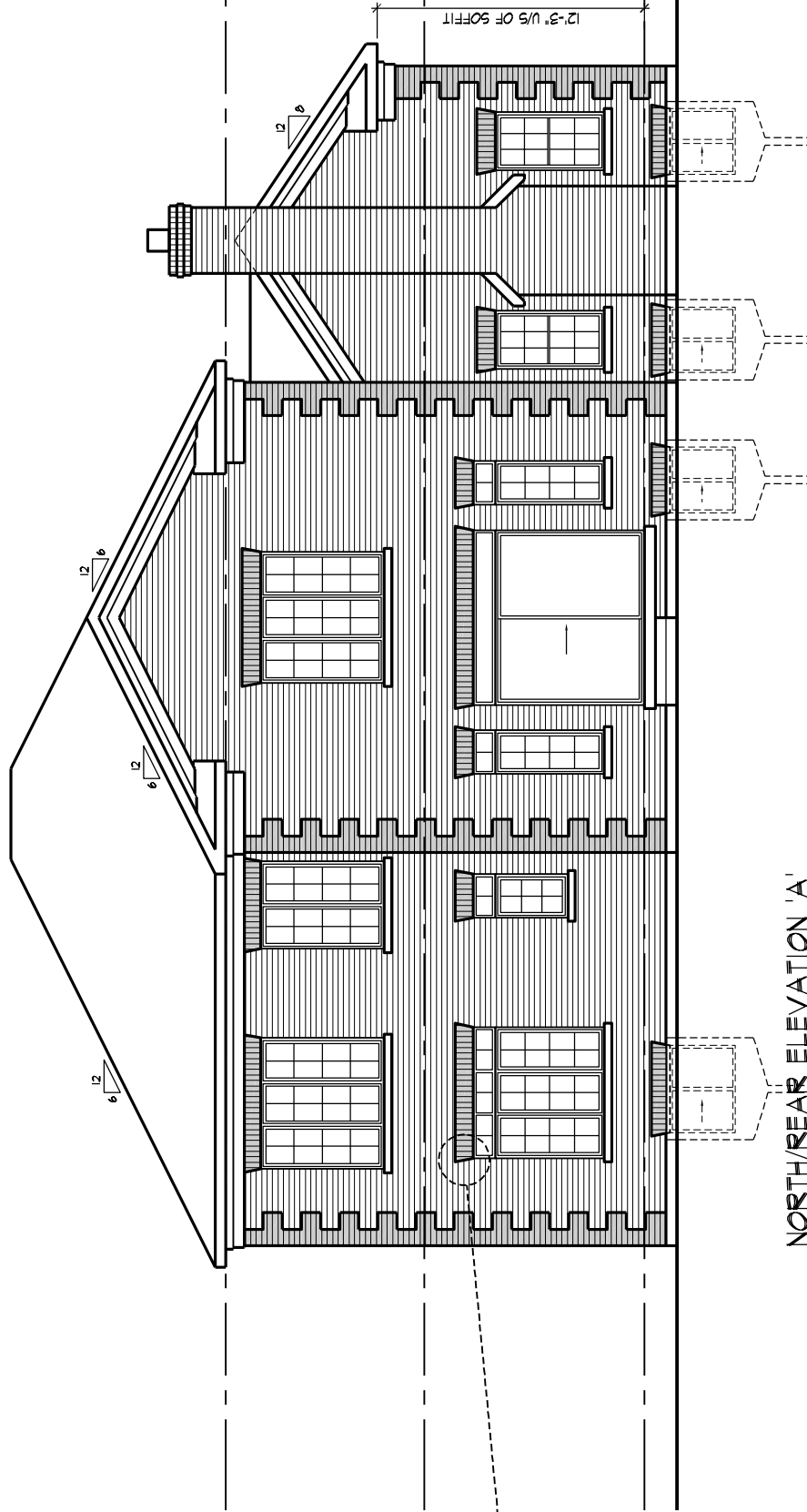
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NORTH/REAR ELEVATION 'A'

 BUFF COLOUR MASONRY
 RED COLOUR MASONRY

NOTE: REUSE AS MANY EXISTING MATERIALS AS POSSIBLE. FINISHING OF THE PROPOSED WORK SHALL BE VERIFIED AND APPROVED BY THE APPLICANT'S MORTAR TO BE USED.

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