

June 21, 2023

FOI No: 2023-38

Redacted S. 22

Pick up of reply to be scheduled

Dear Redacted S. 22,

Re: Request for Records  
Freedom of Information and Protection of Privacy Act

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The City of White Rock has reviewed your request for access to the following records pursuant to the Freedom of Information and Protection of Privacy Act (the "Act"):

- *Building Permits Issued from 2012 to 2016 for 14423 Blackburn Crescent*

Access to these records is available. However, some of the information in the records is excepted from the disclosure requirements of the Act. I have severed the excepted information so that I could disclose to you the remaining information as attached.

The severed information is excepted from disclosure under sections 15 and 22 of the Act. Severing under section 15 is necessary to protect security of any property or system, including a building and section 22 is necessary to avoid disclosing third-party personal information without permission.

Please contact our office if you have any questions or concerns.

Sincerely,



Tracey Arthur  
Director of Corporate Administration  
Att.

Corporate Administration  
P: 604.541.2212 | F: 604.541.9348

City of White Rock  
15322 Buena Vista Avenue, White Rock BC, Canada V4B 1Y6

**WHITE ROCK**  
*City by the Sea!*

[www.whiterockcity.ca](http://www.whiterockcity.ca)

If you believe that the City of White Rock has been unreasonable in its handling of your request, you may ask the Information and Privacy Commissioner to review our response. You have 30 days from receipt of this notice to request a review by writing to:

Office of the Information and Privacy Commissioner  
3rd Floor, 756 Fort Street  
Victoria BC V8W 1H2

Should you decide to request a review, please provide the Commissioner's office with:

1. your name, address and telephone number;
2. a copy of this letter;
3. a copy of your original request sent to the City of White Rock; and
4. the reasons or grounds upon which you are requesting the review.

THE CORPORATION OF THE CITY OF WHITE ROCK

# BUILDING PERMIT

DATE OF ISSUANCE: JUN 17 2013

BUILDING PERMIT No: 13-036

ROLL No: 882.000

PROJECT ADDRESS:

14423 Blackburn Crescent

LEGAL DESCRIPTION:

Lot 18, Sec 10, TP1, NWD, Plan 13899

ZONE:

RS-1

OCCUPANCY:

Residential

REGISTERED SUITE:

NO

DESCRIPTION OF PROJECT:

SFD

OWNER:

Redacted S. 22

OWNER'S ADDRESS:

Redacted S. 22

AUTHORIZED AGENT:

Alex Song (778) 859-5015

BUILDER:

Ruilida Construction Ltd. (Alex Song)

ARCHITECT ON RECORD:

ENGINEER ON RECORD:

D.S. Sidhu (Struct./Geotech) / M.Elmi (Schedule A & BEP)

  
Owner or Authorized Agent

  
Building Official



B.C.B.C. 1.1.2.4 Responsibility of Owner

1) Neither the granting of a building permit nor the approval of the relevant drawings and specifications nor inspections made by the Authority Having Jurisdiction shall in any way relieve the owner of such building from full responsibility for carrying out the work or having the work carried out in full accordance with the requirements of the British Columbia Building Code.

THE CORPORATION OF THE CITY OF WHITE ROCK

# INSPECTION INFORMATION

MAX. PERMITTED HEIGHT: **88.71m (HOUSE)**  
**85.40m (GARAGE)**

ANGLE OF CONTAINMENT: **N/A**

ACTUAL ANGLE:

ACTUAL HEIGHT: .....

BOARD OF VARIANCE APPROVED:	YES <input type="checkbox"/>	NO <input checked="" type="checkbox"/>
TREE PROTECTION AREA:	YES <input type="checkbox"/>	NO <input checked="" type="checkbox"/>
STRUCTURAL ENGINEER ON PROJECT:	YES <input checked="" type="checkbox"/>	NO <input type="checkbox"/>
GEOTECHNICAL ENGINEER ON PROJECT:	YES <input checked="" type="checkbox"/>	NO <input type="checkbox"/>
FORM SURVEY PLAN RECEIVED:	YES <input type="checkbox"/>	NO <input type="checkbox"/>
REGISTERED SUITE APPROVED:	YES <input type="checkbox"/>	NO <input type="checkbox"/>

Project Value:	Permit Fee	Microfiche Fee:	Inspection Fee:	Building Size:	Total:
\$693,940	\$5,900.00	\$50.00	-	-	\$5,950.00

**REMARKS:**

- All construction to comply with the **2012 BC Building Code**
- Schedule C-A required at final.

OCCUPANCY / FINAL GRANTED:.....

Date:.....





THE CORPORATION OF THE CITY OF WHITE ROCK

PLANNING AND DEVELOPMENT SERVICES  
15322 Buena Vista Avenue, White Rock, B.C. V4B 1Y6

City Hall,  
White Rock, B.C.  
Tel: 604-541-2136  
Fax: 604-541-2153

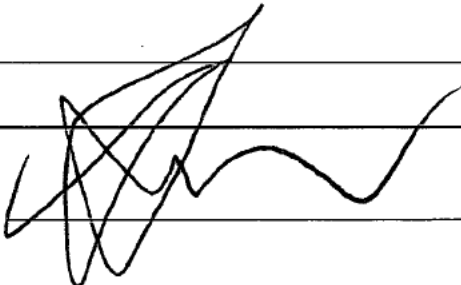
# Inspection Report

NAME: Redacted S. 22  
ADDRESS: 14423 Blackdown Cas  
TYPE OF INSPECTION: Final  
AREA OF INSPECTION: \_\_\_\_\_

PERMIT No.: 13.036  
SHEET No: \_\_\_\_\_  
DATE: Aug 21/14

Building Occupancy + Final  
Approved

SIGNATURE: \_\_\_\_\_  
DATE: \_\_\_\_\_

INSPECTOR: 

Please sign this form when the work is completed and return to the above department.

# Best West Engineers Ltd.

Building Envelope & Structural Engineering Services



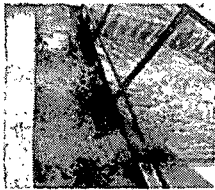
August 20, 2014  
City of White Rock  
Attn: Building Inspector

**PROJECT: SINGLE FAMILY DWELLING AT 14423 BLACKBURN CRESCENT,  
WHITE ROCK, BC**  
**RE: SOUTH BALCONY FIELD REVIEW**

Dear Mr. Guy Gareau  
Building Official,

I had a site visit on <sup>Thursday M.E</sup> ~~Friday~~ August 21, 2014, to review the leak from the South balcony.

I asked the builder to remove the tile and investigate the source of the leak between the flashing and fascia board.

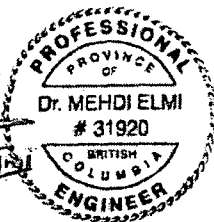


The builder confirms redoing the torch on and re-sealing all 4 sides of the deck's tile flooring.

Regarding this repair, a similar leak is not expected anymore.

We trust this letter provides you with the required information. If you have any question, please do not hesitate to contact us.

Sincerely



Mehdi Elmi, PhD, P.Eng

**Best West Engineers Ltd.**

---

211-3030 Lincoln Avenue, Coquitlam, BC, V3B 6B4, Tel: (604) 468 7304

Email: [info@bwengs.com](mailto:info@bwengs.com) Website: [www.bwengs.com](http://www.bwengs.com)



THE CORPORATION OF THE CITY OF WHITE ROCK

PLANNING AND DEVELOPMENT SERVICES  
15322 Buena Vista Avenue, White Rock, B.C. V4B 1Y6

City Hall,  
White Rock, B.C.  
Tel: 604-541-2136  
Fax: 604-541-2153

# Inspection Report

NAME: Redacted S. 22 PERMIT No.: 13.036  
ADDRESS: 14423 Blackburn SHEET No.:  
TYPE OF INSPECTION: Final DATE: Aug 20 / 11  
AREA OF INSPECTION: \_\_\_\_\_

1) Envelope Engineer to review & Approve report  
a stamp/signed report

SIGNATURE: \_\_\_\_\_

INSPECTOR: 

DATE: \_\_\_\_\_

Please sign this form when the work is completed and return to the above department.



**Redacted S. 22**

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**Fwd: 14423 Blackburn Crescent, Whit Rock, Bc**

2 messages

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Alex <alexsong1212@gmail.com>

Wed, Aug 20, 2014 at 7:42 AM

To: **Redacted S. 22**

Sent from my iPhone

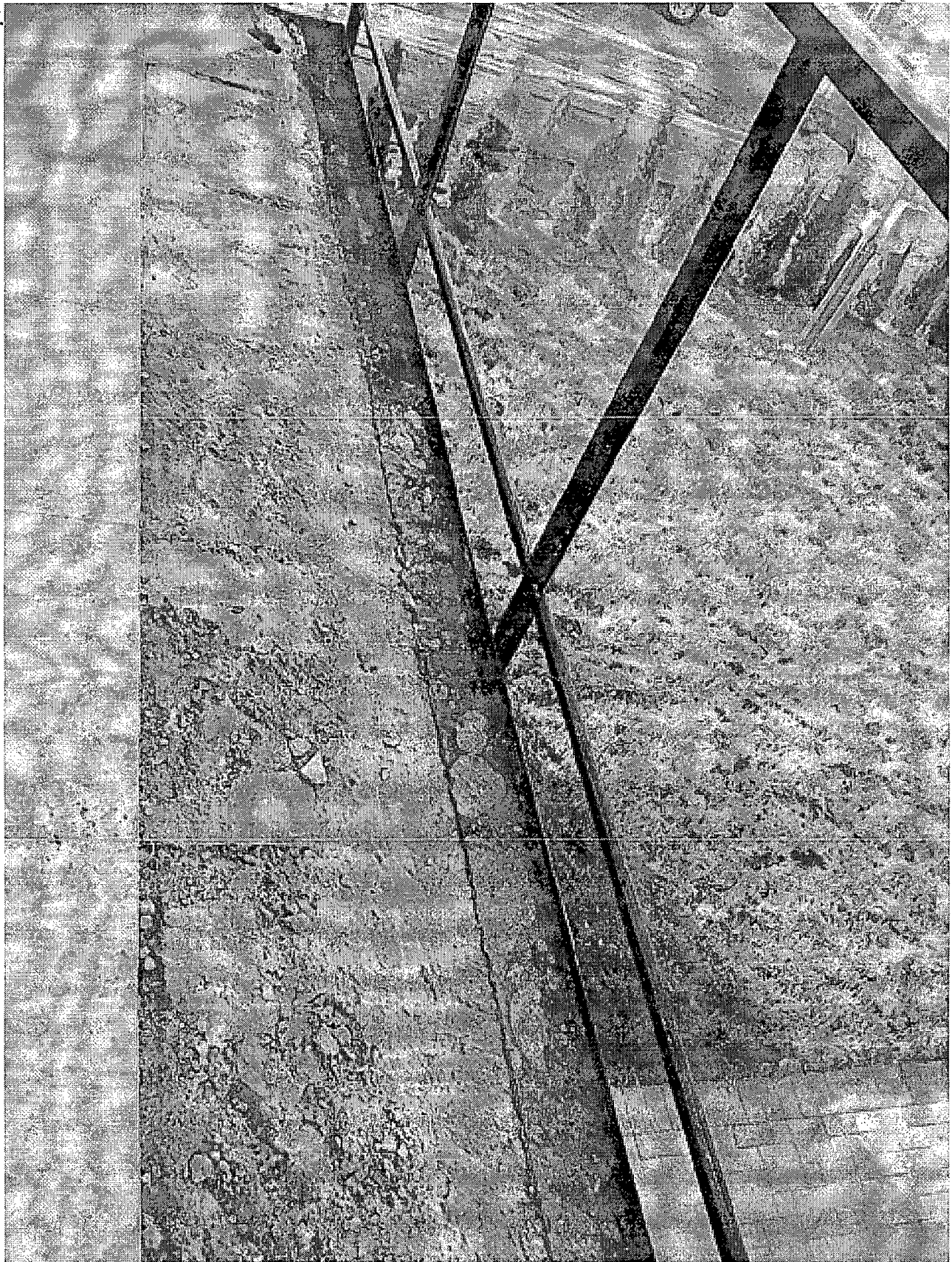
Begin forwarded message:

**From:** Mehdi Elmi <**Redacted S. 22**>  
**Date:** August 19, 2014 at 10:01:40 PM PDT  
**To:** "Ggareau@whiterockcity.ca" <Ggareau@whiterockcity.ca>  
**Cc:** **Redacted S. 22**; ALEX SONG DEVELOPER <alexsong2012@gmail.com>  
**Subject:** 14423 Blackburn Crescent, Whit Rock, Bc

Dear Mr. Guy Gareau  
Building Official ,

I had a site visit on Friday August 15, 2014 ,to review the leak from the South balcony.

I asked the builder to remove the tile and investigate the source of the leak between the flashing and fascia board.



The builder confirms redoing the torch on and re-sealing all 4 sides of the deck's tile flooring. Regarding this repair, a similar leak is not expected anymore.

We trust this letter provides you with the required information. If you have any question, please do not hesitate to contact us.

Sincerely ,

Mehdi Elmi, PhD, P.Eng

**Best West Engineers Ltd.**

211-3030 Lincoln Ave

Coquitlam, BC, V3K 6P6

Tel: 604.468.7304

Email: [info@bwengs.com](mailto:info@bwengs.com)

Web: <http://www.bwengs.com/>





THE CORPORATION OF THE CITY OF WHITE ROCK

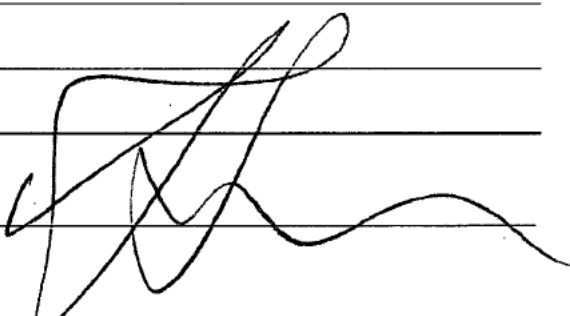
PLANNING AND DEVELOPMENT SERVICES  
15322 Buena Vista Avenue, White Rock, B.C. V4B 1Y6

City Hall,  
White Rock, B.C.  
Tel: 604-541-2136  
Fax: 604-541-2153

# Inspection Report

NAME: Redacted S. 22 PERMIT No.: 13.036  
ADDRESS: 14423 Blackburn Cras SHEET No.:  
TYPE OF INSPECTION: Final DATE: Aug 15/14  
AREA OF INSPECTION:

- 1) Finished flooring @ roof deck landing
- 2) Envelope Engineer to have deck leak at front door repaired.

SIGNATURE: \_\_\_\_\_ INSPECTOR:   
DATE: \_\_\_\_\_

Please sign this form when the work is completed and return to the above department.

# BEST WEST ENGINEERS LTD.

Building Envelope, Geotechnical & Structural Engineering Services

## Field Review Report

ADDRESS: 14423 Blackburn Cresc. White Rock DATE: August 12, 2014

As requested, we made a site visit on August the 6<sup>th</sup> and 12<sup>th</sup> of 2014 to review the water stain on the fascia board of the south balcony.

We checked all details and asked the builder to remove the soffit. No signs of the stain or water ingress were noticed.

The several tests indicate the existing stain is because of the overflow, during the construction.

We confirm there is no water ingress from the deck surface and current drain is functional.

We trust this letter provides you with the required information. If you have any question, please do not hesitate to contact us.

Sincerely,



M. Elmi

Mehdi Elmi, PhD, PEng  
Best West Engineers Ltd.



# BRITISH COLUMBIA BUILDING CODE 2012

## SCHEDULE C-A

Forming Part of Subsection 2.2.7, Division C of the  
British Columbia Building Code

Building Permit No.  
(for authority having jurisdiction's use)

### ASSURANCE OF COORDINATION OF PROFESSIONAL FIELD REVIEW

- Notes:
- (i) This letter must be submitted after completion of the project but before the *occupancy* permit is issued, or a final inspection is made, by the *authority having jurisdiction*.
  - (ii) This letter is endorsed by: Architectural Institute of BC, Association of Professional Engineers and Geoscientists of BC, Building Officials' Association of BC, and Union of BC Municipalities.
  - (iii) In this letter the words in italics have the same meaning as in the British Columbia Building Code.

To: The *authority having jurisdiction*

CITY OF WHITE ROCK

Name of Jurisdiction (Print)

Re: SINGLE FAMILY DWELLING

Name of Project (Print)

14423 BLACKBURN CRESCENT, WHITE ROCK, BC

Address of Project (Print)

Legal Description of Project (Print)

(The *coordinating registered professional* shall complete the following:)

MEHDI ELMI, PhD, P.ENG

Name (Print)

211-3030 LINCOLN AVENUE, COQUITLAM, BC, V3B 6B4

Address (Print) sc

WORK: 604-468-7304 CELL: 604-767-2991

Phone No.

AUGUST 16, 2014

Date

I hereby give assurance that

- (a) I have fulfilled my obligations for coordination of field review of the registered professionals required for the project as outlined in Subsection 2.2.7, Division C of the British Columbia Building Code and in the previously submitted Schedule A, "CONFIRMATION OF COMMITMENT BY OWNER AND BY COORDINATING REGISTERED PROFESSIONAL."
- (b) I have coordinated the functional testing of the fire protection and life safety systems to ascertain that they substantially comply in all material respects with
  - (i) the applicable requirements of the BC Building Code and other applicable enactments respecting safety, not including construction safety aspects, and
  - (ii) the plans and supporting documents submitted in support of the application for the building permit,
- (c) I am a registered professional as defined in the British Columbia Building Code.

(If the *registered professional* is a member of a firm, complete the following:)

I am a member of the firm BEST-WEST ENGINEERS LTD.

and I sign this letter on behalf of the firm. (Print name of firm)

Note: The above letter must be signed by a *coordinating registered professional*, who is also a *registered professional*. The British Columbia Building Code defines a *registered professional* to mean

- (a) a person who is registered or licensed to practise as an architect under the Architects Act, or
- (b) a person who is registered or licensed to practise as a professional engineer under the Engineers and Geoscientists Act.

M.E

CRP's Initials

# BRITISH COLUMBIA BUILDING CODE 2012

## SCHEDULE C-B

Forming Part of Subsection 2.2.7, Division C of the  
British Columbia Building Code

Building Permit No.  
(for authority having jurisdiction's use)

### ASSURANCE OF PROFESSIONAL FIELD REVIEW AND COMPLIANCE

- Notes:
- (i) This letter must be submitted after completion of the project but prior to final inspection by the *authority having jurisdiction*. A separate letter must be submitted by each *registered professional of record*.
  - (ii) This letter is endorsed by: Architectural Institute of B.C., Association of Professional Engineers and Geoscientists of B.C., Building Officials' Association of B.C., and Union of B.C. Municipalities.
  - (iii) In this letter the words in italics have the same meaning as in the British Columbia Building Code.

To: The *authority having jurisdiction*  
CITY OF WHITE ROCK

Name of Jurisdiction (Print)

Re: ARCHITECTURAL(BUILDING ENVELOPE)

Discipline (e.g. Architectural, etc.) (Print)

SINGLE FAMILY DWELLING

Name of Project (Print)

14423 BLACKBURN CRESCENT, WHITE ROCK, BC

Address of Project (Print)

(Each *registered professional of record* shall complete the following:)

MEHDI ELMI, PhD, P.ENG

Name (Print)

211-3030 LINCOLN AVENUE, COQUITLAM, BC, V3B 6B4

Address (Print)

WORK:604-468-7304 CELL: 604-7672991

Phone No.

AUGUST 16, 2014

Date

I hereby give assurance that

- (a) I have fulfilled my obligations for *field review* as outlined in Subsection 2.2.7, Division C of the British Columbia Building Code and in the previously submitted Schedule B, "ASSURANCE OF PROFESSIONAL DESIGN AND COMMITMENT FOR FIELD REVIEW", and
- (b) those components of the project opposite my initials in Schedule B substantially comply in all material respects with
  - (i) the applicable requirements of the B.C. Building Code and other applicable enactments respecting safety, not including construction safety aspects, and
  - (ii) the plans and supporting documents submitted in support of the application for the *building permit*,
- (c) I am a *registered professional of record* as defined in the British Columbia Building Code.

(If the *registered professional of record* is a member of a firm, complete the following:)

I am a member of the firm, BEST-WEST ENGINEERS LTD.

and I sign this letter on behalf of the firm.

(Print name of firm)

Note: The above letter must be signed by a *registered professional of record*, who is a *registered professional*. The British Columbia Building Code defines a *registered professional* to mean

- (a) a person who is registered or licensed to practise as an architect under the Architects Act, or
- (b) a person who is registered or licensed to practise as a professional engineer under the Engineers and Geoscientists Act.

ME

CRP's Initials

# BRITISH COLUMBIA BUILDING CODE 2012

## SCHEDULE C-B

Forming Part of Subsection 2.2.7, Division C of the  
British Columbia Building Code

Building Permit No.  
(for authority having jurisdiction's use)

### ASSURANCE OF PROFESSIONAL FIELD REVIEW AND COMPLIANCE

- Notes:
- (i) This letter must be submitted after completion of the project but prior to final inspection by the *authority having jurisdiction*. A separate letter must be submitted by each *registered professional of record*.
  - (ii) This letter is endorsed by: Architectural Institute of B.C., Association of Professional Engineers and Geoscientists of B.C., Building Officials' Association of B.C., and Union of B.C. Municipalities.
  - (iii) In this letter the words in italics have the same meaning as in the British Columbia Building Code.

To: The *authority having jurisdiction*  
The City of White Rock

Name of Jurisdiction (Print)

Re: **Structural & Geotechnical only**

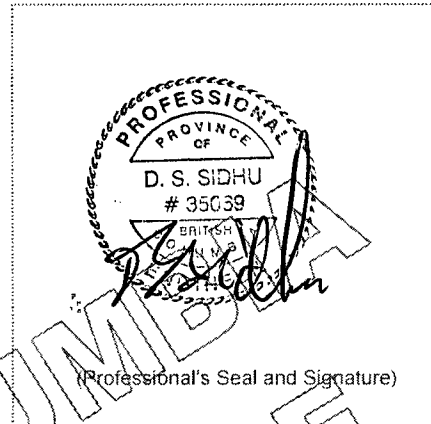
Discipline (e.g. Architectural, etc.) (Print)

**Single Family Dwelling & Detached Garage**

Name of Project (Print)

**14423-Blackburn Crescent White Rock, BC.**

Address of Project (Print)



(Professional's Seal and Signature)

(Each *registered professional of record* shall complete the following:)

**Deepinder Sidhu, P.Eng.**

Name (Print)

**12968-66 Avenue**

Address (Print)

**Surrey, BC. V3W 7H3**

**604-700-8153**

Phone No.

**08/06/2014**

Date

I hereby give assurance that

- (a) I have fulfilled my obligations for *field review* as outlined in Subsection 2.2.7, Division C of the British Columbia Building Code and in the previously submitted Schedule B, "ASSURANCE OF PROFESSIONAL DESIGN AND COMMITMENT FOR FIELD REVIEW", and
- (b) those components of the project opposite my initials in Schedule B substantially comply in all material respects with
  - (i) the applicable requirements of the B.C. Building Code and other applicable enactments respecting safety, not including construction safety aspects, and
  - (ii) the plans and supporting documents submitted in support of the application for the *building permit*,
- (c) I am a *registered professional of record* as defined in the British Columbia Building Code.

(If the *registered professional of record* is a member of a firm, complete the following:)

I am a member of the firm  
and I sign this letter on behalf of the firm.

**Optimum Engineering Corp.**

(Print name of firm)

Note: The above letter must be signed by a *registered professional of record*, who is a *registered professional*. The British Columbia Building Code defines a *registered professional* to mean

- (a) a person who is registered or licensed to practise as an architect under the Architects Act, or
- (b) a person who is registered or licensed to practise as a professional engineer under the Engineers and Geoscientists Act.

**M.E**

CRP's Initials



THE CORPORATION OF THE CITY OF WHITE ROCK

PLANNING AND DEVELOPMENT SERVICES  
15322 Buena Vista Avenue, White Rock, B.C. V4B 1Y6

City Hall,  
White Rock, B.C.  
Tel: 604-541-2136  
Fax: 604-541-2153

# Inspection Report

Redacted S. 22

NAME: \_\_\_\_\_

PERMIT No.: 13036

ADDRESS: 14423 Blackburn Cres

SHEET No.: 1 of 201

TYPE OF INSPECTION: building final

DATE: July 20, 14

AREA OF INSPECTION: \_\_\_\_\_

- 1.) ✓ envelope engineer, structural engineer schedule 'C' req'd.
- 2.) ✓ centre south deck leaking into soffit - letter from envelope engineer req'd.
- 3.) ✓ caulking missing around windows
- 4.) ✓ seal soffit below south face projection.
- 5.) ✓ condensing unit fixing penetration of exterior wall to be sealed & made good.
- 6.) ✓ remove all form ties from fnd. walls.
- 7.) ✓ rear basement entry seal wood trim to retaining walls.
- 8.) ✓ remove nails from garage fnd; seal electrical conduits penetrating garage exterior wall

see next page →

SIGNATURE: \_\_\_\_\_

INSPECTOR: \_\_\_\_\_

DATE: \_\_\_\_\_

Please sign this form when the work is completed and return to the above department.



THE CORPORATION OF THE CITY OF WHITE ROCK

PLANNING AND DEVELOPMENT SERVICES  
15322 Buena Vista Avenue, White Rock, B.C. V4B 1Y6

City Hall,  
White Rock, B.C.  
Tel: 604-541-2136  
Fax: 604-541-2153

# Inspection Report

NAME: Redacted S. 22 PERMIT No.: 13056  
 ADDRESS: 14423 Blackburn Cres. SHEET No.: 2 of 2  
 TYPE OF INSPECTION: building final. DATE: July 28/14  
 AREA OF INSPECTION: \_\_\_\_\_

- 9.) adjust spice kitchen hood fan
- 10.) glass interior guardrail to be secured.
- 11.) stairs to roof top deck not appeared as constructed.

*JA*

SIGNATURE: \_\_\_\_\_ INSPECTOR: *[Signature]*  
 DATE: \_\_\_\_\_

Please sign this form when the work is completed and return to the above department.

BRITISH COLUMBIA BUILDING CODE 2012

SCHEDULE C-B

Forming Part of Subsection 2.2.7, Division C of the British Columbia Building Code

Building Permit No. (for authority having jurisdiction's use)

ASSURANCE OF PROFESSIONAL FIELD REVIEW AND COMPLIANCE

- Notes: (i) This letter must be submitted after completion of the project but prior to final inspection by the authority having jurisdiction. A separate letter must be submitted by each registered professional of record. (ii) This letter is endorsed by: Architectural Institute of B.C., Association of Professional Engineers and Geoscientists of B.C., Building Officials' Association of B.C., and Union of B.C. Municipalities. (iii) In this letter the words in italics have the same meaning as in the British Columbia Building Code.

To: The authority having jurisdiction. City of White Rock. Name of Jurisdiction (Print)
Re: Fire Suppression Systems. Discipline (e.g. Architectural, etc.) (Print)
SFD. Name of Project (Print)
14423 Blackburn Cres., WR. Address of Project (Print)



(Each registered professional of record shall complete the following:)

Fred Lee. Name (Print)
3571 Worthington Dr., Vancouver, BC, V3M 3Y1. Address (Print)
604-618-0438. Phone No.

(Professional's Seal and Signature)

JUL 17 2014

Date

I hereby give assurance that

- (a) I have fulfilled my obligations for field review as outlined in Subsection 2.2.7, Division C of the British Columbia Building Code and in the previously submitted Schedule B, "ASSURANCE OF PROFESSIONAL DESIGN AND COMMITMENT FOR FIELD REVIEW" and
(b) those components of the project opposite my initials in Schedule B substantially comply in all material respects with
(i) the applicable requirements of the B.C. Building Code and other applicable enactments respecting safety, not including construction safety aspects, and
(ii) the plans and supporting documents submitted in support of the application for the building permit,
(c) I am a registered professional of record as defined in the British Columbia Building Code.

(If the registered professional of record is a member of a firm, complete the following:)

I am a member of the firm FKL Engineering Consultants Ltd. and I sign this letter on behalf of the firm. (Print name of firm)

Note: The above letter must be signed by a registered professional of record, who is a registered professional. The British Columbia Building Code defines a registered professional to mean

- (a) a person who is registered or licensed to practise as an architect under the Architects Act, or
(b) a person who is registered or licensed to practise as a professional engineer under the Engineers and Geoscientists Act.

CRP's Initials

Sch C-B
Fire Sprinkler

BRITISH COLUMBIA BUILDING CODE 2012

SCHEDULE C-B

Forming Part of Subsection 2.2.7, Division C of the British Columbia Building Code

Building Permit No. (for authority having jurisdiction's use)

ASSURANCE OF PROFESSIONAL FIELD REVIEW AND COMPLIANCE

- Notes: (i) This letter must be submitted after completion of the project but prior to final inspection by the authority having jurisdiction. A separate letter must be submitted by each registered professional of record. (ii) This letter is endorsed by: Architectural Institute of B.C., Association of Professional Engineers and Geoscientists of B.C., Building Officials' Association of B.C., and Union of B.C. Municipalities. (iii) In this letter the words in italics have the same meaning as in the British Columbia Building Code.

To: The authority having jurisdiction City of White Rock
Name of Jurisdiction (Print)
Re: Plumbing (Drain Tile Sump Pump, spec only)
Discipline (e.g. Architectural, etc.) (Print)
SFU
Name of Project (Print)
14423 Blackburn Cres., WR
Address of Project (Print)



(Each registered professional of record shall complete the following:)
Fred Lee
Name (Print)
3571 Worthington Dr., Vancouver, BC, V3M 3Y1
Address (Print)
604-618-0438
Phone No.

(Professional's Seal and Signature)
JUL 10 2014
Date

I hereby give assurance that

- (a) I have fulfilled my obligations for field review as outlined in Subsection 2.2.7, Division C of the British Columbia Building Code and in the previously submitted Schedule B, "ASSURANCE OF PROFESSIONAL DESIGN AND COMMITMENT FOR FIELD REVIEW", and
(b) those components of the project opposite my initials in Schedule B substantially comply in all material respects with
(i) the applicable requirements of the B.C. Building Code and other applicable enactments respecting safety, not including construction safety aspects, and
(ii) the plans and supporting documents submitted in support of the application for the building permit,
(c) I am a registered professional of record as defined in the British Columbia Building Code.

(If the registered professional of record is a member of a firm, complete the following:)

I am a member of the firm FKL Engineering Consultants Ltd.
and I sign this letter on behalf of the firm. (Print name of firm)

Note: The above letter must be signed by a registered professional of record, who is a registered professional. The British Columbia Building Code defines a registered professional to mean

- (a) a person who is registered or licensed to practise as an architect under the Architects Act, or
(b) a person who is registered or licensed to practise as a professional engineer under the Engineers and Geoscientists Act.

Sch C-B
B
Drain Tile
Sump Pump

BRITISH COLUMBIA BUILDING CODE 2012

SCHEDULE B

Forming Part of Subsection 2.2.7, Div. C of the British Columbia Building Code

Building Permit No. (for authority having jurisdiction's use)

ASSURANCE OF PROFESSIONAL DESIGN AND COMMITMENT FOR FIELD REVIEW

- Notes: (i) This letter must be submitted prior to the commencement of construction activities of the components identified below. A separate letter must be submitted by each registered professional of record. (ii) This letter is endorsed by: Architectural Institute of B.C., Association of Professional Engineers and Geoscientists of B.C., Building Officials' Association of B.C., and Union of B.C. Municipalities. (iii) In this letter the words in italics have the same meaning as in the British Columbia Building Code.

To: The authority having jurisdiction

City of White Rock.

Name of Jurisdiction (Print)

Re: SED

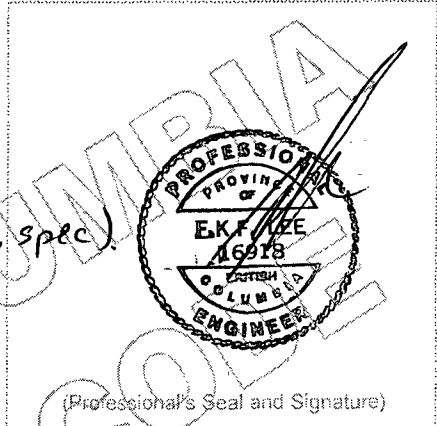
Name of Project (Print)

14423 Blackburn Cres. WR

Address of Project (Print)

The undersigned hereby gives assurance that the design of the (Initial those of the items listed below that apply to this registered professional of record. All the disciplines will not necessarily be employed on every project.)

- ARCHITECTURAL
STRUCTURAL
MECHANICAL
PLUMBING (Drain Tile Sump Pump, spec)
FIRE SUPPRESSION SYSTEMS
ELECTRICAL
GEOTECHNICAL - temporary
GEOTECHNICAL - permanent



(Professional's Seal and Signature)

JUL 10 2014

Date

components of the plans and supporting documents prepared by this registered professional of record in support of the application for the building permit as outlined below substantially comply with the B.C. Building Code and other applicable enactments respecting safety except for construction safety aspects.

The undersigned hereby undertakes to be responsible for field reviews of the above referenced components during construction, as indicated on the "SUMMARY OF DESIGN AND FIELD REVIEW REQUIREMENTS" below.

CRP's Initials



BRITISH COLUMBIA BUILDING CODE 2012

Schedule B - Continued

Building Permit No.  
(for authority having jurisdiction's use)

14423 Blackburn Cres., WR  
Project Address

~~Fire Suppression Systems~~  
Plumbing Discipline

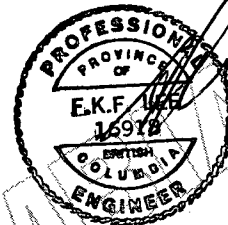
The undersigned also undertakes to notify the authority having jurisdiction in writing as soon as possible if the undersigned's contract for field review is terminated at any time during construction.

I certify that I am a registered professional as defined in the British Columbia Building Code.

Fred Lee

Registered Professional of Record's Name (Print)  
3571 Worthington Dr., Vancouver, BC, V5M 3Y1  
Address (Print)

604-618-0438  
Phone No.



(Professional's Seal and Signature)

JUL 10 2014

Date

(If the Registered Professional of Record is a member of a firm, complete the following.)

I am a member of the firm FKL Engineering Consultants Ltd.  
and I sign this letter on behalf of the firm. (Print name of firm)

Note: The above letter must be signed by a registered professional of record, who is a registered professional. The British Columbia Building Code defines a registered professional to mean

- (a) a person who is registered or licensed to practise as an architect under the Architects Act, or
- (b) a person who is registered or licensed to practise as a professional engineer under the Engineers and Geoscientists Act.

CRP's Initials

# BRITISH COLUMBIA BUILDING CODE 2012

Schedule B - Continued

Building Permit No.  
(for authority having jurisdiction's use)

14423 Blackburn Cres. WR  
Project Address

~~Fire Suppression Systems~~  
Plumbing Discipline

## SUMMARY OF DESIGN AND FIELD REVIEW REQUIREMENTS

(Initial applicable discipline below and cross out and initial only those items not applicable to the project.)

### ARCHITECTURAL

- 1.1 Fire resisting assemblies
- 1.2 *Fire separations* and their continuity
- 1.3 *Closures*, including tightness and operation
- 1.4 Egress systems, including *access to exit* within *suites* and *floor areas*
- 1.5 Performance and physical safety features (guardrails, handrails, etc.)
- 1.6 Structural capacity of architectural components, including anchorage and seismic restraint
- 1.7 Sound control
- 1.8 Landscaping, screening and site grading
- 1.9 Provisions for fire fighting access
- 1.10 Access requirements for *persons with disabilities*
- 1.11 Elevating devices
- 1.12 Functional testing of architecturally related fire emergency systems and devices
- 1.13 Development Permit and conditions therein
- 1.14 Interior signage, including acceptable materials, dimensions and locations
- 1.15 Review of all applicable shop drawings
- 1.16 Interior and exterior finishes
- 1.17 Dampproofing and/or waterproofing of walls and slabs below grade
- 1.18 Roofing and flashings
- 1.19 Wall cladding systems
- 1.20 Condensation control and cavity ventilation
- 1.21 Exterior glazing
- 1.22 Integration of building envelope components
- 1.23 Environmental separation requirements (Part 5)
- 1.24 Building Envelope, Part 10/ASHRAE Requirements

### STRUCTURAL

- 2.1 Structural capacity of structural components of the *building*, including anchorage and seismic restraint
- 2.2 Structural aspects of *deep foundations*
- 2.3 Review of all applicable shop drawings
- 2.4 Structural aspects of unbonded post-tensioned concrete design and construction

### MECHANICAL

- 3.1 HVAC systems and devices, including high *building* requirements where applicable
- 3.2 *Fire dampers* at required *fire separations*
- 3.3 Continuity of *fire separations* at HVAC penetrations
- 3.4 Functional testing of mechanically related fire emergency systems and devices
- 3.5 Maintenance manuals for mechanical systems
- 3.6 Structural capacity of mechanical components, including anchorage and seismic restraint
- 3.7 Review of all applicable shop drawings
- 3.8 Mechanical Systems, Part 10/ASHRAE Requirements



(Professional's Seal and Signature)

JUL 10 2014

Date

BRITISH COLUMBIA BUILDING CODE 2012

Schedule B - Continued

Building Permit No.  
(for authority having jurisdiction's use)

14423 Blackburn Cres., WK  
Project Address

~~Fire Suppression Systems~~

~~Plumbing~~

Discipline

~~PLUMBING~~

- ~~4.1 Roof drainage systems~~
- ~~4.2 Site and foundation drainage systems~~ (Drain Tile Sump Pump, Spec. Only)
- ~~4.3 Plumbing systems and devices~~
- ~~4.4 Continuity of fire separations at plumbing penetrations~~
- ~~4.5 Functional testing of plumbing related fire emergency systems and devices~~
- ~~4.6 Maintenance manuals for plumbing systems~~
- ~~4.7 Structural capacity of plumbing components, including anchorage and seismic restraint~~
- ~~4.8 Review of all applicable shop drawings~~
- ~~4.9 Plumbing Systems, Part 40 requirements~~

~~FIRE SUPPRESSION SYSTEMS~~

- ~~5.1 Suppression system classification for type of occupancy~~
- ~~5.2 Design coverage, including concealed or special areas~~
- ~~5.3 Compatibility and location of electrical supervision, ancillary alarm and control devices~~
- ~~5.4 Evaluation of the capacity of city (municipal) water supply versus system demands and domestic demand, including pumping devices where necessary~~
- ~~5.5 Qualification of welder, quality of welds and material~~
- ~~5.6 Review of all applicable shop drawings~~
- ~~5.7 Acceptance testing for "Contractor's Material and Test Certificate" as per NFPA Standards~~
- ~~5.8 Maintenance program and manual for suppression systems~~
- ~~5.9 Structural capacity of sprinkler components, including anchorage and seismic restraint~~
- ~~5.10 For partial systems — confirm sprinklers are installed in all areas where required~~
- ~~5.11 Fire Department connections and hydrant locations~~
- ~~5.12 Fire hose standpipes~~
- ~~5.13 Freeze protection measures for fire suppression systems~~
- ~~5.14 Functional testing of fire suppression systems and devices~~

~~ELECTRICAL~~

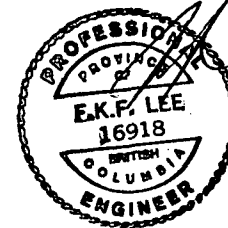
- ~~6.1 Electrical systems and devices, including high building requirements where applicable~~
- ~~6.2 Continuity of fire separations at electrical penetrations~~
- ~~6.3 Functional testing of electrical related fire emergency systems and devices~~
- ~~6.4 Electrical systems and devices maintenance manuals~~
- ~~6.5 Structural capacity of electrical components, including anchorage and seismic restraint~~
- ~~6.6 Clearances from buildings of all electrical utility equipment~~
- ~~6.7 Fire protection of wiring for emergency systems~~
- ~~6.8 Review of all applicable shop drawings~~
- ~~6.9 Electrical Systems, Part 10/ASHRAE requirements~~

~~GEOTECHNICAL — Temporary~~

- ~~7.1 Excavation~~
- ~~7.2 Shoring~~
- ~~7.3 Underpinning~~
- ~~7.4 Temporary construction dewatering~~

~~GEOTECHNICAL — Permanent~~

- ~~8.1 Bearing capacity of the soil~~
- ~~8.2 Geotechnical aspects of deep foundations~~
- ~~8.3 Compaction of engineered fill~~
- ~~8.4 Structural considerations of soil, including slope stability and seismic loading~~
- ~~8.5 Backfill~~
- ~~8.6 Permanent dewatering~~
- ~~8.7 Permanent underpinning~~



(Professional's Seal and Signature)

JUL 10 2014

Date

CRP's Initials



# TONG NGO ENGINEERING LTD.

16968 77A Ave., Surrey, B.C. V4N 6L2

Tel : 604.372.2120  
Cell : 604.763.4658  
Fax : 604.502.0936  
tneltd@yahoo.ca  
info@tnengineering.ca

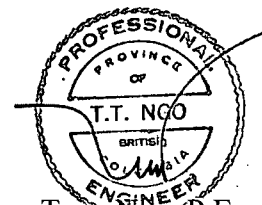
## Inspection Report

Report No.: 1  
Project No: KFW3-14  
To: KSS Finishing & Woodworking Attention: Karmjit  
From: Tong Ngo, P.Eng. Date: July 17, 2014  
Project: Single Family House – Glass Guardrail  
14423 Blackburn Cr., Whiterock, BC  
Ref: Inspection of Interior Stair And Balcony Glass Guardrail

Inspected and approved the installation of glass guardrail of the interior balcony and stair.

Guardrail designed and fabrication according to part 4 of the BCBC 2012  
And the APEG guidelines for glass railings

Glass guardrail designed in conformance with CAN/CGSB-12.20-M (structural design of glass for buildings).



Tong Ngo, P.Eng.  
July 17, 2014

# BRITISH COLUMBIA BUILDING CODE 2012

## SCHEDULE B

Forming Part of Subsection 2.2.7, Div. C of the  
British Columbia Building Code

Building Permit No. \_\_\_\_\_  
(for authority having jurisdiction's use)

### ASSURANCE OF PROFESSIONAL DESIGN AND COMMITMENT FOR FIELD REVIEW

- Notes: (i) This letter must be submitted prior to the commencement of construction activities of the components identified below. A separate letter must be submitted by each *registered professional of record*.  
(ii) This letter is endorsed by: Architectural Institute of B.C., Association of Professional Engineers and Geoscientists of B.C., Building Officials' Association of B.C., and Union of B.C. Municipalities.  
(iii) In this letter the words in italics have the same meaning as in the British Columbia Building Code.

To: The authority having jurisdiction

CITY OF WHITEROCK

Name of Jurisdiction (Print)

Re: SINGLE FAMILY HOUSE - GLASS GUARDRAIL

Name of Project (Print)

14423 BLACKBURN CR., WHITEROCK, BC

Address of Project (Print)

The undersigned hereby gives assurance that the design of the  
(Initial those of the items listed below that apply to this *registered professional of record*. All the disciplines will not necessarily be employed on every project.)

- ARCHITECTURAL  
 STRUCTURAL INT. BALCONY + STAIR  
 MECHANICAL GLASS GUARDRAIL  
 PLUMBING  
 FIRE SUPPRESSION SYSTEMS  
 ELECTRICAL  
 GEOTECHNICAL — temporary  
 GEOTECHNICAL — permanent



(Professional's Seal and Signature)

JULY 17, 2014

Date

components of the plans and supporting documents prepared by this *registered professional of record* in support of the application for the *building permit* as outlined below substantially comply with the B.C. Building Code and other applicable enactments respecting safety except for construction safety aspects.

The undersigned hereby undertakes to be responsible for *field reviews* of the above referenced components during construction, as indicated on the "SUMMARY OF DESIGN AND FIELD REVIEW REQUIREMENTS" below.

\_\_\_\_\_  
CRP's Initials

# BRITISH COLUMBIA BUILDING CODE 2012

Schedule B - Continued

Building Permit No.  
(for authority having jurisdiction's use)

14423 BLACKBURN CR., WHITEROCK, BC

Project Address

STRUCTURAL (GLASS GUARDRAIL)

Discipline

The undersigned also undertakes to notify the *authority having jurisdiction* in writing as soon as possible if the undersigned's contract for *field review* is terminated at any time during construction.

I certify that I am a *registered professional* as defined in the British Columbia Building Code.

TONG NGO, P.ENG.

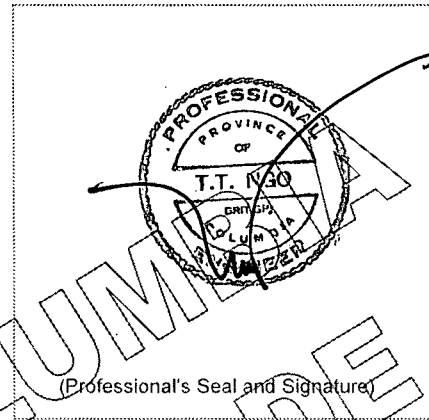
Registered Professional of Record's Name (Print)

16968 77A AVENUE, SURREY, BC V4N 6L2

Address (Print)

604.372.2120

Phone No.



(Professional's Seal and Signature)

JULY 17, 2014

Date

(If the *Registered Professional of Record* is a member of a firm, complete the following.)

I am a member of the firm  
and I sign this letter on behalf of the firm.

TONG NGO ENGINEERING LTD.

(Print name of firm)

Note: The above letter must be signed by a *registered professional of record*, who is a *registered professional*. The British Columbia Building Code defines a *registered professional* to mean

- (a) a person who is registered or licensed to practise as an architect under the Architects Act, or
- (b) a person who is registered or licensed to practise as a professional engineer under the Engineers and Geoscientists Act.

CRP's Initials

# BRITISH COLUMBIA BUILDING CODE 2012

Schedule B - Continued

Building Permit No.  
(for authority having jurisdiction's use)

14423 BLACKBURN CR., WHITEROCK, BC

Project Address

STRUCTURAL (GLASS GUARDRAIL)

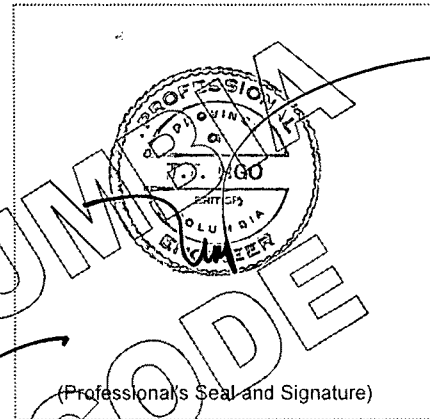
Discipline

## SUMMARY OF DESIGN AND FIELD REVIEW REQUIREMENTS

(Initial applicable discipline below and cross out and initial only those items not applicable to the project.)

### ARCHITECTURAL

- 1.1 Fire resisting assemblies
- 1.2 ~~Fire separations~~ and their continuity
- 1.3 ~~Closures~~, including tightness and operation
- 1.4 Egress systems, including *access to exit* within *suites* and *floor areas*
- 1.5 Performance and physical safety features (guardrails, handrails, etc.)
- 1.6 Structural capacity of architectural components, including anchorage and seismic restraint
- 1.7 Sound control
- 1.8 Landscaping, screening and site grading
- 1.9 Provisions for fire fighting access
- 1.10 Access requirements for *persons with disabilities*
- 1.11 Elevating devices
- 1.12 Functional testing of architecturally related fire emergency systems and devices
- 1.13 Development Permit and conditions therein
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- 1.15 Review of all applicable shop drawings
- 1.16 Interior and exterior finishes
- 1.17 Dampproofing and/or waterproofing of walls and slabs below grade
- 1.18 Roofing and flashings
- 1.19 Wall cladding systems
- 1.20 Condensation control and cavity ventilation
- 1.21 Exterior glazing
- 1.22 Integration of building envelope components
- 1.23 Environmental separation requirements (Part 5)
- 1.24 Building Envelope, Part 10/ASHRAE Requirements



JULY 17, 2014

### STRUCTURAL

- 2.1 Structural capacity of structural components of the ~~building~~, including anchorage and seismic restraint
- 2.2 ~~Structural aspects of deep foundations~~
- 2.3 Review of all applicable shop drawings
- 2.4 ~~Structural aspects of unbonded post-tensioned concrete design and construction~~

### MECHANICAL

- 3.1 HVAC systems and devices, including high *building* requirements where applicable
- 3.2 ~~Fire dampers~~ at required *fire separations*
- 3.3 Continuity of *fire separations* at HVAC penetrations
- 3.4 Functional testing of mechanically related fire emergency systems and devices
- 3.5 Maintenance manuals for mechanical systems
- 3.6 Structural capacity of mechanical components, including anchorage and seismic restraint
- 3.7 Review of all applicable shop drawings
- 3.8 Mechanical Systems, Part 10/ASHRAE Requirements

INT. BALCONY + STAIR Date  
GLASS GUARDRAIL

CRP's Initials

BRITISH COLUMBIA BUILDING CODE 2012

Schedule B - Continued

Building Permit No.  
(for authority having jurisdiction's use)

14423 BLACKBURN CR., WHITEROCK, BC

Project Address

STRUCTURAL (GLASS GUARDRAIL)

Discipline

**PLUMBING**

- 4.1 Roof drainage systems
- 4.2 Site and foundation drainage systems
- 4.3 Plumbing systems and devices
- 4.4 Continuity of fire separations at plumbing penetrations
- 4.5 Functional testing of plumbing related fire emergency systems and devices
- 4.6 Maintenance manuals for plumbing systems
- 4.7 Structural capacity of plumbing components, including anchorage and seismic restraint
- 4.8 Review of all applicable shop drawings
- 4.9 Plumbing Systems, Part 10 requirements

**FIRE SUPPRESSION SYSTEMS**

- 5.1 Suppression system classification for type of occupancy
- 5.2 Design coverage, including concealed or special areas
- 5.3 Compatibility and location of electrical supervision, ancillary alarm and control devices
- 5.4 Evaluation of the capacity of city (municipal) water supply versus system demands and domestic demand, including pumping devices where necessary
- 5.5 Qualification of welder, quality of welds and material
- 5.6 Review of all applicable shop drawings
- 5.7 Acceptance testing for "Contractor's Material and Test-Certificate" as per NFPA Standards
- 5.8 Maintenance program and manual for suppression systems
- 5.9 Structural capacity of sprinkler components, including anchorage and seismic restraint
- 5.10 For partial systems — confirm sprinklers are installed in all areas where required
- 5.11 Fire Department connections and hydrant locations
- 5.12 Fire hose standpipes
- 5.13 Freeze protection measures for fire suppression systems
- 5.14 Functional testing of fire suppression systems and devices

**ELECTRICAL**

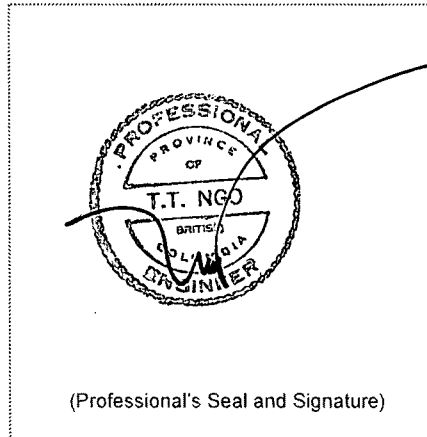
- 6.1 Electrical systems and devices, including high building requirements where applicable
- 6.2 Continuity of fire separations at electrical penetrations
- 6.3 Functional testing of electrical related fire emergency systems and devices
- 6.4 Electrical systems and devices maintenance manuals
- 6.5 Structural capacity of electrical components, including anchorage and seismic restraint
- 6.6 Clearances from buildings of all electrical utility equipment
- 6.7 Fire protection of wiring for emergency systems
- 6.8 Review of all applicable shop drawings
- 6.9 Electrical Systems, Part 10/ASHRAE requirements

**GEOTECHNICAL — Temporary**

- 7.1 Excavation
- 7.2 Shoring
- 7.3 Underpinning
- 7.4 Temporary construction dewatering

**GEOTECHNICAL — Permanent**

- 8.1 Bearing capacity of the soil
- 8.2 Geotechnical aspects of deep foundations
- 8.3 Compaction of engineered fill
- 8.4 Structural considerations of soil, including slope stability and seismic loading
- 8.5 Backfill
- 8.6 Permanent dewatering
- 8.7 Permanent underpinning



JULY 17, 2014

Date

CRP's Initials



# BRITISH COLUMBIA BUILDING CODE 2012

## SCHEDULE C-B

Forming Part of Subsection 2.2.7, Division C of the  
British Columbia Building Code

Building Permit No. \_\_\_\_\_  
(for authority having jurisdiction's use)

### ASSURANCE OF PROFESSIONAL FIELD REVIEW AND COMPLIANCE

- Notes:
- (i) This letter must be submitted after completion of the project but prior to final inspection by the *authority having jurisdiction*. A separate letter must be submitted by each *registered professional of record*.
  - (ii) This letter is endorsed by: Architectural Institute of B.C., Association of Professional Engineers and Geoscientists of B.C., Building Officials' Association of B.C., and Union of B.C. Municipalities.
  - (iii) In this letter the words in italics have the same meaning as in the British Columbia Building Code.

To: The *authority having jurisdiction*

CITY OF WHITEROCK

Name of Jurisdiction (Print)

Re: STRUCTURAL (GLASS GUARDRAIL) INT. BALCONY + STAIR GLASS GUARDRAIL

Discipline (e.g. Architectural, etc.) (Print)

SINGLE FAMILY HOUSE - GLASS GUARDRAIL

Name of Project (Print)

14423 BLACKBURN CR., WHITEROCK, BC

Address of Project (Print)

(Each *registered professional of record* shall complete the following:)

TONG NGO, P.ENG.

Name (Print)

16968 77A AVENUE, SURREY,

Address (Print)

BC V4N 6L2

604.372.2120

Phone No.

JULY 17, 2014

Date

(Professional's Seal and Signature)

I hereby give assurance that

- (a) I have fulfilled my obligations for *field review* as outlined in Subsection 2.2.7, Division C of the British Columbia Building Code and in the previously submitted Schedule B, "ASSURANCE OF PROFESSIONAL DESIGN AND COMMITMENT FOR FIELD REVIEW", and
- (b) those components of the project opposite my initials in Schedule B substantially comply in all material respects with
  - (i) the applicable requirements of the B.C. Building Code and other applicable enactments respecting safety, not including construction safety aspects, and
  - (ii) the plans and supporting documents submitted in support of the application for the *building permit*,
- (c) I am a *registered professional of record* as defined in the British Columbia Building Code.

(If the *registered professional of record* is a member of a firm, complete the following:)

I am a member of the firm \_\_\_\_\_  
and I sign this letter on behalf of the firm.

TONG NGO ENGINEERING LTD.

(Print name of firm)

Note: The above letter must be signed by a *registered professional of record*, who is a *registered professional*. The British Columbia Building Code defines a *registered professional* to mean

- (a) a person who is registered or licensed to practise as an architect under the Architects Act, or
- (b) a person who is registered or licensed to practise as a professional engineer under the Engineers and Geoscientists Act.

\_\_\_\_\_  
CRP's Initials



THE CORPORATION OF THE CITY OF WHITE ROCK

PLANNING AND DEVELOPMENT SERVICES  
15322 Buena Vista Avenue, White Rock, B.C. V4B 1Y6

City Hall,  
White Rock, B.C.  
Tel: 604-541-2136  
Fax: 604-541-2153

# Inspection Report

NAME: Redacted S. 22 PERMIT No.: 13036  
 ADDRESS: 14423 Bloctburn Cres SHEET No.: 1  
 TYPE OF INSPECTION: re-final DATE: July 29/14  
 AREA OF INSPECTION: plumb

plumbing final - passed  
recall for building final  
flow alarm switch to be tested  
at that time

SIGNATURE: \_\_\_\_\_ INSPECTOR: [Signature]  
 DATE: \_\_\_\_\_

Please sign this form when the work is completed and return to the above department.







THE CORPORATION OF THE CITY OF WHITE ROCK

PLANNING AND DEVELOPMENT SERVICES  
15322 Buena Vista Avenue, White Rock, B.C. V4B 1Y6

City Hall,  
White Rock, B.C.  
Tel: 604-541-2136  
Fax: 604-541-2153

# Inspection Report

NAME: Redacted S. 22

PERMIT No.: 13-036

ADDRESS: 14423 Blackburn

SHEET No: \_\_\_\_\_

TYPE OF INSPECTION: Plumbing

DATE: July 13/14

AREA OF INSPECTION: Final

- ✓ 1) Proper seismic strapping required on hot water tank - pipe strap not permitted.
- ✓ 2) Leaks to be repaired at both the Domestic & Fire Sprinkler shut offs - Main shut off
- ✓ 3) Wrench for Fire Sprinkler heads to be placed in red Fire Sprinkler cabinet
- 4) Fire Sprinkler Flow switch to be tested.
- 5) Label all remote shut offs
- ✓ 6) Pump motor in Master to made accessible

Recall

SIGNATURE: \_\_\_\_\_

INSPECTOR: 

DATE: \_\_\_\_\_

Please sign this form when the work is completed and return to the above department.



THE CORPORATION OF THE CITY OF WHITE ROCK

PLANNING AND DEVELOPMENT SERVICES  
15322 Buena Vista Avenue, White Rock, B.C. V4B 1Y6

City Hall,  
White Rock, B.C.  
Tel: 604-541-2136  
Fax: 604-541-2153

# Inspection Report

NAME: Redacted S. 22 PERMIT No.: 13-036  
ADDRESS: 14423 Blackburn Crs SHEET No.: \_\_\_\_\_  
TYPE OF INSPECTION: Plumbing DATE: July 8/14  
AREA OF INSPECTION: Backflow Device (lawn Irrigation)

Double check valve installed

1) Device test report to be onsite  
Recall

SIGNATURE: \_\_\_\_\_

INSPECTOR: 

DATE: \_\_\_\_\_

Please sign this form when the work is completed and return to the above department.



# THE CORPORATION OF THE CITY OF WHITE ROCK

15322 Buena Vista Avenue, White Rock, B.C. V4B 1Y6

Telephone: (604) 541-2136 Fax: (604) 541-2153

Permit Number: **6731**

Date: July 4 2014

## APPLICATION FOR PLUMBING/SPRINKLER PERMIT

Location of Work: 14423 Blackburn Cir Occupancy: Res. Type of Work: New  Existing  Additional

Owner: **Redacted S. 22** Phone: **Redacted S. 22** T.Q. Number: \_\_\_\_\_

Contractor: Green Scapes Irrigation Phone: 604 786 2450 Business Licence: Yes:  No:  Applied For: \_\_\_\_\_

Floor	Water Heater	Urinals	Water Closets	Wash Basins	Bath Tubs	Showers	Kitchen Sink	Bar Sink	Dish Washer	Wash Tubs	Automatic Washer	Floor Drains	Hose Bibs	Sump	Double Check Valve	Sprinklers	Other Fixtures
Basement															1		
Main																	
Second																	
Third																	
Fourth																	
Fifth																	
Sixth																	
<b>TOTAL</b>															1		
Fixture Units																	

NS PLUM PER  
 IN  
 K: 167259 / R: 214071401 / D: 3454  
 Jul/2014 CELIM  
 50.00  
 225.00  
 04/

Water Service Size: \_\_\_\_\_ Total Fixture Units: \_\_\_\_\_ Total No. of Fixtures: \_\_\_\_\_ PERMIT FEE: \$ 50.00

Signature (Applicant): [Signature]

Signature (Building Official): [Signature]

And I agree to conform to all requirements of the "City of White Rock Building By Law"

COMMENTS: \_\_\_\_\_



THE CORPORATION OF THE CITY OF WHITE ROCK

PLANNING AND DEVELOPMENT SERVICES

15322 Buena Vista Avenue, White Rock, B.C. V4B 1Y6

City Hall  
White Rock, B.C.  
Tel: 604-541-2136  
Fax: 604-541-2153

# Inspection Report

Redacted S. 22

NAME: \_\_\_\_\_

PERMIT No.: 13-036

ADDRESS: 14423 Blackburn Cres

SHEET No: \_\_\_\_\_

TYPE OF INSPECTION: Frame/Insulation

DATE: Feb 12/14

AREA OF INSPECTION: \_\_\_\_\_

- ✓ 1) Add roof vent @ staircase roof
- ✓ 2) Box ends in crawl to be insulated & Poly'd

✓ Approval subject to above

SIGNATURE: \_\_\_\_\_

INSPECTOR: 

DATE: \_\_\_\_\_

Please sign this form when the work is completed and return to the above department.







**A-1 TRUSS (2002) LTD.**

Unit # 201, 8334-128 St Surrey, B.C. V3W 4G2  
 PHONE: 580-2200, 591-2266 FAX: 591-2260



**PROJECT INFORMATION**  
 LOCATION: 14423 BLACKBURN CR WHITE ROCK  
 REF#: SONG-1542  
 BUILDER: ALEX SONG  
 PHONE#: 778-859-5015

**DESIGN INFORMATION**  
 GROUND SNOW LOAD:  
 RAIN LOAD:  
 ROOFING MATERIAL:  
 UPPER ROOF PITCH:  
 LOWER ROOF PITCH:  
 CONCRETE FLOOR: \_\_\_\_\_

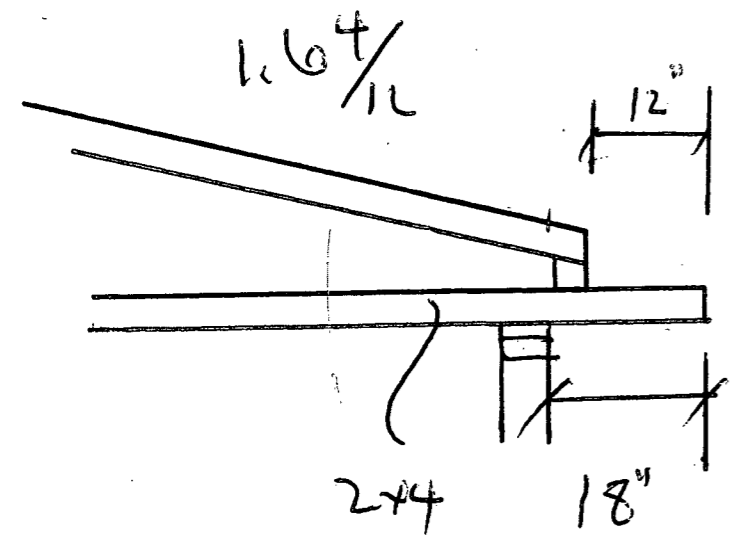
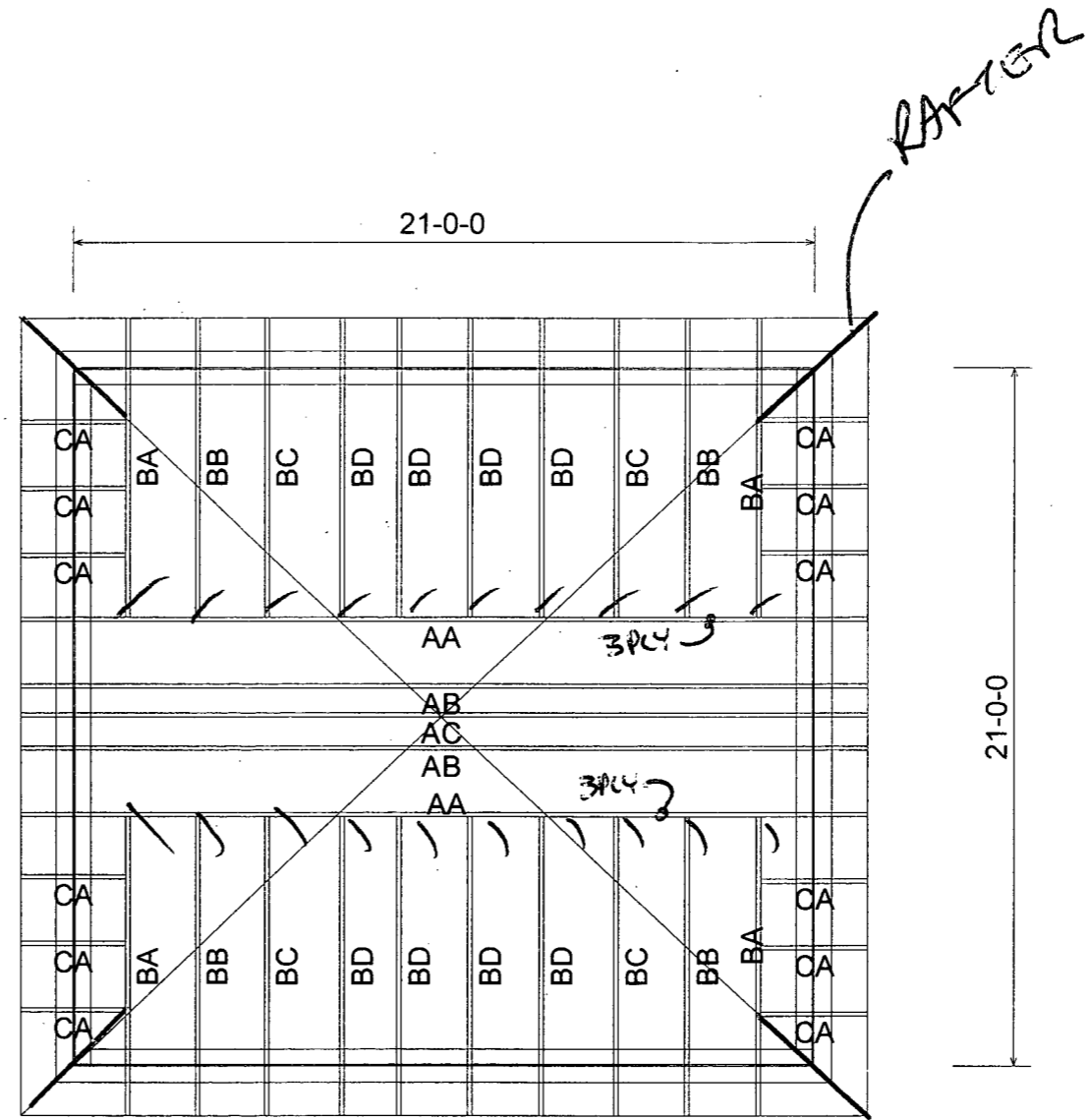
NOTE: LOADS ARE ESTIMATES ONLY.  
 NOTE: LOADS SHOWN ARE UNFACTORED  
 B.C.B.C. 2006

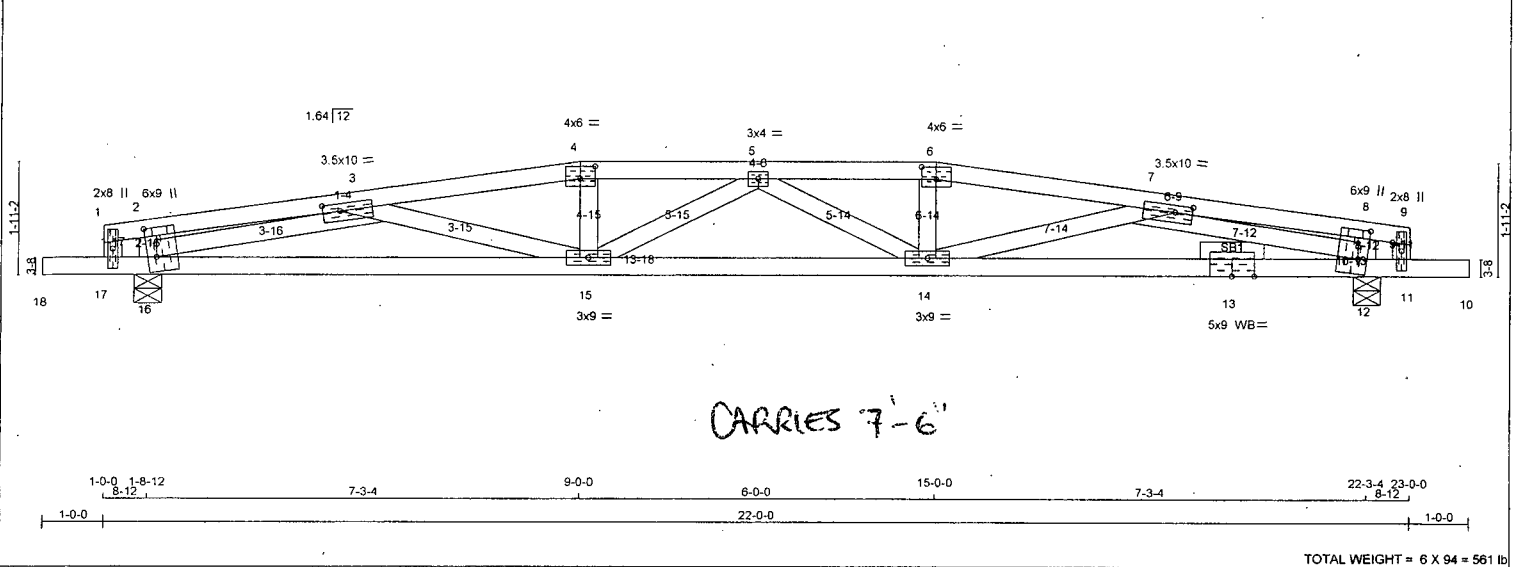
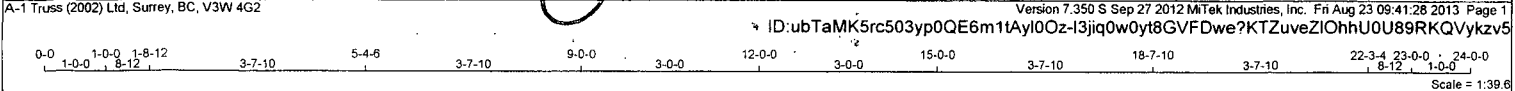
**DESIGN LOADS**  
 TOP CHORD LIVE LOAD:  
 TOP CHORD DEAD LOAD:  
 BOTTOM CHORD DEAD LOAD: \_\_\_\_\_  
 TOTAL DESIGN LOAD: \_\_\_\_\_

**HANGER LEGEND**

	LU24L
	LJS26DS
	HHUS26-2
	HGUS26
	HGUS26-2
	SPECIAL _____

DRAWING SCALE:  
 DRAWN BY: FS  
 DRAWING DATE: Aug 21, 2013





**LUMBER**

N. L. G. A. RULES

CHORDS	SIZE	LUMBER	DESCR.
1 - 4	2x4	DRY SS	DF
4 - 6	2x4	DRY SS	DF
6 - 9	2x4	DRY SS	DF
17 - 1	2x4	DRY No.2	SPF
11 - 9	2x4	DRY No.2	SPF
18 - 13	2x4	DRY SS	DF
13 - 10	2x4	DRY SS	DF

ALL WEBS 2x4 DRY No.2 SPF  
DRY: SEASONED LUMBER.

DESIGN CONSISTS OF 3 TRUSSES BUILT SEPARATELY THEN FASTENED TOGETHER WITH (0.122"x3") SPIRAL NAILS STAGGERED THROUGHOUT BOTH FACES AS PER NAILING PATTERN

CHORDS #ROWS	SPACING(IN)	LOAD(PLF)
1-4	12	TOP
4-6	12	TOP
6-9	12	TOP
17-1	12	TOP
11-9	12	TOP
18-13	8	SIDE(119.1)
13-10	8	SIDE(119.1)

WEBS 2x4 6

TOP - COMPONENTS ARE LOADED FROM THE TOP AND MUST BE PLACED ON TOP EDGE OF ALL PLYS FOR THE LOAD TO BE TRANSFERRED TO EACH PLY.

SIDE - PLF SHOWN IS THE EQUIVALENT UDL APPLIED TO ONE SIDE THAT THE CORRESPONDING NAILING PATTERN SHALL BE CAPABLE OF TRANSFERING. REMAINING PLF MUST BE APPLIED ON THE OPPOSITE SIDE OR ON THE TOP.

**PLATES (table is in inches)**

JT TYPE	PLATES	W	LEN	Y	X
1	TMBV+p	MT20	2.0	8.0	
2	TMBWWW+t	MT20	6.0	9.0	6.00 1.75
3	TMWW-t	MT20	3.5	10.0	1.50 3.50
4	TTW-t	MT20	4.0	6.0	2.50 3.00
5	TMWW-t	MT20	3.0	4.0	
6	TTW-t	MT20	4.0	6.0	2.50 3.00
7	TMWW-t	MT20	3.5	10.0	1.50 3.50
8	TMBWWW+t	MT20	6.0	9.0	6.00 1.75
9	TMBV+p	MT20	2.0	8.0	
13	BS-t	MT20	5.0	9.0	
14	BMWWW-t	MT20	3.0	9.0	
15	BMWWW-t	MT20	3.0	9.0	

WB - INDICATES BLOCKING REQUIRED

**DIMENSIONS, SUPPORTS AND LOADINGS SPECIFIED BY FABRICATOR TO BE VERIFIED BY BUILDING DESIGNER**

PROVIDE ADEQUATE DRAINAGE TO PREVENT PONDING

**BEARINGS**

JT	VERT	HORZ	DOWN	HORZ	UPLIFT	IN-SX	IN-SX
16	3535	0	3535	0	0	5-8	1-11
12	3535	0	3535	0	0	5-8	1-11

**UNFACTORED REACTIONS**

JT	1ST LCASE	MAX	MIN	COMPONENT	REACTIONS
16	2498	1650 / 0	0 / 0	SNOW	WIND
12	2498	1650 / 0	0 / 0	SNOW	WIND

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) 16, 12

**BRACING**  
TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 4.22FT.  
MAX. UNBRACED BOTTOM CHORD LENGTH = 10.00FT. OR RIGID CEILING DIRECTLY APPLIED.

**LOADING**  
TOTAL LOAD CASES: (3)

CHORDS			WEBS					
MEMB.	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD (PLF)	LC1	MAX UNBRAC LENGTH	MEMB.	MAX. FACTORED FORCE (LBS)	MAX. FACTORED CSI (LC)	
1-2	-87 / 0	-124.2	-124.2	0.15 (1)	6.25	16-2	0 / 335	0.02 (1)
2-3	0 / 5	-124.2	-124.2	0.17 (1)	10.00	16-3	-8212 / 0	0.67 (1)
3-4	-9787 / 0	-124.2	-124.2	0.16 (1)	4.22	3-15	0 / 1940	0.14 (1)
4-5	-9787 / 0	-124.2	-124.2	0.14 (1)	4.24	15-4	0 / 931	0.07 (1)
5-6	-9787 / 0	-124.2	-124.2	0.14 (1)	4.24	15-5	-368 / 0	0.02 (1)
6-7	-9787 / 0	-124.2	-124.2	0.16 (1)	4.22	14-6	-368 / 0	0.02 (1)
7-8	0 / 5	-124.2	-124.2	0.17 (1)	10.00	14-7	0 / 931	0.07 (1)
8-9	-87 / 0	-124.2	-124.2	0.15 (1)	6.25	14-8	0 / 1940	0.14 (1)
17-1	-536 / 0	0.0	0.0	0.02 (1)	7.81	7-12	-8212 / 0	0.67 (1)
11-9	-536 / 0	0.0	0.0	0.02 (1)	7.81	12-8	0 / 335	0.02 (1)
18-17	0 / 0	-141.7	-141.7	0.03 (1)	10.00			
17-16	0 / 0	-17.5	-17.5	0.25 (1)	10.00			
16-15	0 / 7845	-196.1	-196.1	0.81 (1)	10.00			
15-14	0 / 10106	-196.1	-196.1	0.85 (1)	10.00			
14-13	0 / 7845	-196.1	-196.1	0.81 (1)	10.00			
13-12	0 / 7845	-196.1	-196.1	0.81 (1)	10.00			
12-11	0 / 0	-17.5	-17.5	0.25 (1)	10.00			
11-10	0 / 0	-141.7	-141.7	0.03 (1)	10.00			

TOTAL WEIGHT = 6 X 94 = 561 lb

**DESIGN CRITERIA**

SPECIFIED LOADS:

TOP CH. LL = 33.1 PSF  
DL = 10.0 PSF

BOT CH. LL = 0.0 PSF  
DL = 7.0 PSF

TOTAL LOAD = 50.1 PSF

**SPACING = 24.0 IN. / C/C**

LOADING IN FLAT SECTION BASED ON A SLOPE OF 6.00/12

GIRDER TYPE: CStdGirder  
START SPAN CARRIED = 6-0  
START SPAN CARRIED = 7-6-0  
END DISTANCE = 21-6-0  
END SPAN CARRIED = 7-6-0  
END WALL WIDTH = 5-8  
APPLIED TO FRONT SIDE OF BOTTOM CHORD.  
- ADDTL LOADS BASED ON 55% OF GSL.

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBC2010

THIS DESIGN COMPLIES WITH:  
- PART 9 OF OBC 2012, BCBC 2012, ABC 2012  
- CSA 086-09  
- TPIC 2011

**DESIGN ASSUMPTIONS**  
- PERCENTAGE OF GROUND SNOW LOAD IS USER-DEFINED.  
- OVERHANG NOT TO BE ALTERED OR CUT OFF.

(55% OF 52.5 P.S.F. G.S.L. PLUS  
4.2 P.S.F. RAIN LOAD EQUALS  
33.1 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL) = L/360 (0.68")  
CALCULATED VERT. DEFL.(LL) = L/999 (0.18")  
ALLOWABLE DEFL.(TL) = L/360 (0.68")  
CALCULATED VERT. DEFL.(TL) = L/731 (0.34")

**CANTILEVER DEFLECTION:**  
ALLOWABLE DEFL.(LL) = L/207 (0.19")  
CALCULATED VERT. DEFL.(LL) = L/270 (0.08")  
ALLOWABLE DEFL.(TL) = L/360 (0.19")  
CALCULATED VERT. DEFL.(TL) = L/207 (0.15")

CSI: TC=0.17 (2-3:1), BC=0.65 (14-15:1), WB=0.67 (7-12:1), SSI=0.20 (12-14:1)

DOL LUMBER=1.00 NAIL=1.00 LS BEND=1.10  
COMP=1.10 SHEAR=1.10 TENS=1.10

COMPANION LIVE LOAD FACTOR = 0.50  
FLAT ROOF FACTOR = 0.75

TRUSS PLATE MANUFACTURER IS NOT RESPONSIBLE FOR QUALITY CONTROL IN THE TRUSS MANUFACTURING PLANT.

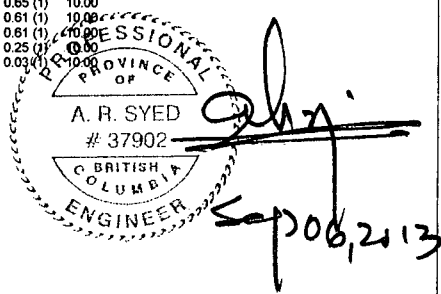
**NAIL VALUES**

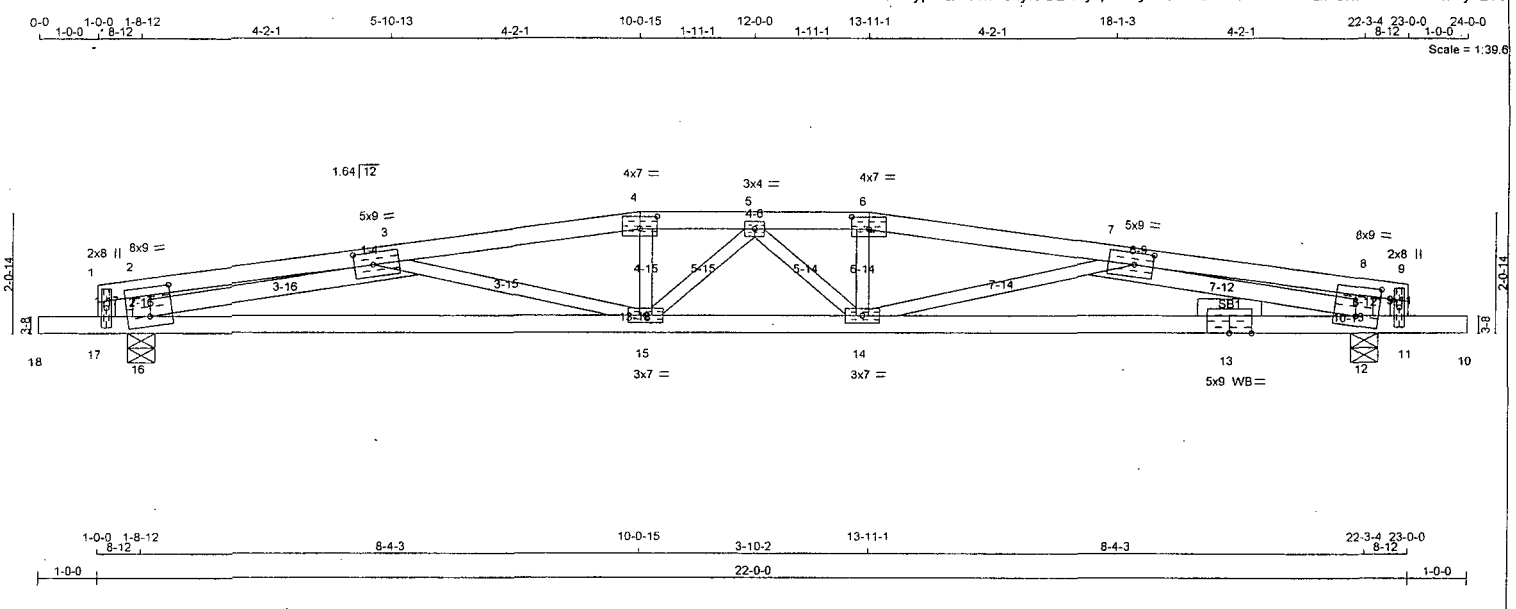
PLATE	GRIP(DRY)	SHEAR (PS)	SECTION (PL)
MT20	618	354	1667 822 2284 1656

PLATE PLACEMENT TOL. = 0.250 inches

PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP = 0.87 (4) (INPUT = 0.90)  
JSI METAL = 0.86 (13) (INPUT = 1.00)





TOTAL WEIGHT = 2 X 87 = 173 lb [M]R

**LUMBER**  
N. L. G. A. RULES

CHORDS	SIZE	LUMBER	DESCR.
1 - 4	2x4	DRY No.2	SPF
4 - 6	2x4	DRY No.2	SPF
6 - 9	2x4	DRY No.2	SPF
17 - 1	2x4	DRY No.2	SPF
11 - 9	2x4	DRY No.2	SPF
18 - 13	2x4	DRY SS	DF
13 - 10	2x4	DRY SS	DF
ALL WEBS EXCEPT	2x3	DRY No.2	SPF
16 - 2	2x4	DRY No.2	SPF
16 - 3	2x4	DRY SS	DF
7 - 12	2x4	DRY SS	DF
12 - 8	2x4	DRY No.2	SPF

DRY: SEASONED LUMBER.

**PLATES (table is in inches)**

JT	TYPE	PLATES	W	LEN	Y	X
1	TMBM+p	MT20	2.0	8.0		
2	TMBMWW-1	MT20	8.0	9.0	6.00	4.50
3	TMWW-1	MT20	5.0	9.0	2.50	3.75
4	TTW-1	MT20	4.0	7.0	2.50	3.50
5	TMWW-1	MT20	3.0	4.0		
6	TTW-1	MT20	4.0	7.0	2.50	3.50
7	TMWW-1	MT20	5.0	9.0	2.50	3.75
8	TMBMWW-1	MT20	8.0	9.0	6.00	4.50
9	TMBM+p	MT20	2.0	8.0		
13	BS-1	MT20	5.0	9.0		
14	BMWW-1	MT20	3.0	7.0		
15	BMWW-1	MT20	3.0	7.0		

WB - INDICATES BLOCKING REQUIRED

**DIMENSIONS, SUPPORTS AND LOADINGS SPECIFIED BY FABRICATOR TO BE VERIFIED BY BUILDING DESIGNER**

**BEARINGS**  
PROVIDE ADEQUATE DRAINAGE TO PREVENT PONDING

JT	VERT	HORZ	DOWN	HORZ	UPLIFT	IN-SX	IN-SX
16	1701	0	1701	0	0	5-8	3-14
12	1701	0	1701	0	0	5-8	3-14

**UNFACTORED REACTIONS**  
1ST LCASE: SNOW/MIN. COMPONENT REACTIONS

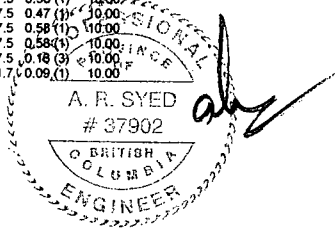
JT	COMBINED	SNOW	LIVE	WIND	DEAD
16	1202	794 / 0	0 / 0	0 / 0	408 / 0
12	1202	794 / 0	0 / 0	0 / 0	408 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) 16, 12

**BRACING**  
TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 2.62FT.  
MAX. UNBRACED BOTTOM CHORD LENGTH = 10.00FT. OR RIGID CEILING DIRECTLY APPLIED.

**LOADING**  
TOTAL LOAD CASES: (3)

MEMB	FR-TO	MAX. FACTORED FORCE (LBS)	CHORDS		WEBS			
			FACTORED VERT. LOAD (PLF)	MAX. CSI (LC)	MAX. UNBRACED LENGTH	MAX. FACTORED FORCE (LBS)	MAX. CSI (LC)	
1-2	-2 / 27	-124.2	-124.2	0.26 (1)	10.00	16-2	-502 / 0	0.07 (1)
2-3	0 / 16	-124.2	-124.2	0.29 (1)	10.00	16-3	-4048 / 0	0.88 (1)
3-4	-3978 / 0	-124.2	-124.2	0.72 (1)	2.62	3-15	0 / 120	0.06 (3)
4-5	-3948 / 0	-124.2	-124.2	0.38 (1)	3.08	15-4	0 / 207	0.06 (1)
5-6	-3948 / 0	-124.2	-124.2	0.38 (1)	3.08	15-5	-177 / 0	0.04 (1)
6-7	-3978 / 0	-124.2	-124.2	0.72 (1)	2.62	5-14	-177 / 0	0.04 (1)
7-8	0 / 16	-124.2	-124.2	0.29 (1)	10.00	14-6	0 / 207	0.06 (1)
8-9	-2 / 27	-124.2	-124.2	0.26 (1)	10.00	14-7	0 / 120	0.06 (3)
17-1	-25 / 155	0.0	0.0	0.03 (1)	7.81	7-12	-4048 / 0	0.88 (1)
11-9	-25 / 155	0.0	0.0	0.03 (1)	7.81	12-8	-502 / 0	0.07 (1)
18-17	0 / 0	-141.7	-141.7	0.09 (1)	10.00			
17-16	0 / 0	-17.5	-17.5	0.16 (3)	10.00			
16-15	0 / 3875	-17.5	-17.5	0.58 (1)	10.00			
15-14	0 / 4075	-17.5	-17.5	0.47 (1)	10.00			
14-13	0 / 3875	-17.5	-17.5	0.58 (1)	10.00			
13-12	0 / 3875	-17.5	-17.5	0.58 (1)	10.00			
12-11	0 / 0	-17.5	-17.5	0.18 (3)	10.00			
11-10	0 / 0	-141.7	-141.7	0.09 (1)	10.00			



**DESIGN CRITERIA**

**SPECIFIED LOADS:**

TOP CH. LL	=	33.1	PSF
DL	=	10.0	PSF
BOT CH. LL	=	0.0	PSF
DL	=	7.0	PSF
TOTAL LOAD	=	50.1	PSF

**SPACING = 24.0 IN./C/C**

LOADING IN FLAT SECTION BASED ON A SLOPE OF 6.00/12

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBC 2010

THIS DESIGN COMPLIES WITH:  
- PART 9 OF OBC 2012, BCBC 2012, ABC 2012  
- CSA 086-09  
- TPIC 2011

**DESIGN ASSUMPTIONS**  
- PERCENTAGE OF GROUND SNOW LOAD IS USER-DEFINED.  
- OVER-HANG NOT TO BE ALTERED OR CUT OFF.

(55 % OF 52.5 P.S.F. G.S.L. PLUS  
4.2 P.S.F. RAIN LOAD EQUALS  
33.1 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL) = L/360 (0.68")  
CALCULATED VERT. DEFL.(LL) = L/999 (0.22")  
ALLOWABLE DEFL.(TL) = L/360 (0.68")  
CALCULATED VERT. DEFL.(TL) = L/616 (0.40")

**CANTILEVER DEFLECTION:**  
ALLOWABLE DEFL.(LL) = L/207 (0.19")  
CALCULATED VERT. DEFL.(LL) = L/363 (0.06")  
ALLOWABLE DEFL.(TL) = L/360 (0.19")  
CALCULATED VERT. DEFL.(TL) = L/207 (0.13")

CSI: TC=0.72 (3-4:1), BC=0.58 (15-16:1), WB=0.88 (3-16:1), SSI=0.30 (3-4:1)

DOL LUMBER=1.00 NAIL=1.00 LS BEND=1.10  
COMP=1.10 SHEAR=1.10 TENS=1.10

COMPANION LIVE LOAD FACTOR = 0.50  
FLAT ROOF FACTOR = 0.75

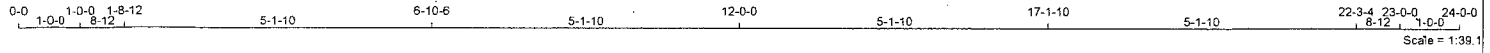
TRUSS PLATE MANUFACTURER IS NOT RESPONSIBLE FOR QUALITY CONTROL IN THE TRUSS MANUFACTURING PLANT.

**NAIL VALUES**

PLATE	GRIP(DRY)	SHEAR (PSI)	SECTION (PLI)	MIN	MAX
MT20	618	354	1667	822	2284 1656

PLATE PLACEMENT TOL. = 0.250 inches  
PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.89 (8) (INPUT = 0.90)  
JSI METAL= 1.00 (13) (INPUT = 1.00)



**LUMBER**

N. L. G. A. RULES

CHORDS	SIZE	LUMBER	DESCR.
1 - 4	2x4	DRY SS	DF
4 - 7	2x4	DRY SS	DF
16 - 1	2x4	DRY No.2	SPF
9 - 7	2x4	DRY No.2	SPF
17 - 11	2x4	DRY SS	DF
11 - 8	2x4	DRY SS	DF

ALL WEBS	EXCEPT	SIZE	LUMBER	DESCR.
13 - 4	2x3	DRY No.2	SPF	
12 - 5	2x3	DRY No.2	SPF	
13 - 5	2x3	DRY No.2	SPF	
3 - 13	2x3	DRY No.2	SPF	
14 - 3	2x3	DRY No.2	SPF	

DRY: SEASONED LUMBER.

**PLATES (table is in inches)**

JT	TYPE	PLATES	W	LEN	Y	X
1	TMBM+p	MT20	2.0	8.0		
2	TMBMWW-I	MT20	7.0	10.0	1.75	4.75
3	TMMW-I	MT20	3.0	4.0		
4	TTW-p	MT20	4.0	7.0	2.25	3.50
5	TMMW-I	MT20	3.0	4.0		
6	TMBMWW-I	MT20	7.0	10.0	1.75	4.75
7	TMBM+p	MT20	2.0	8.0		
11	BS-I	MT20	3.5	4.0		
12	BMWW-I	MT20	5.0	10.0	1.75	5.00
13	BMWWW-I	MT20	3.0	7.0		
14	BMWW-I	MT20	5.0	10.0	1.75	5.00

**DIMENSIONS, SUPPORTS, AND LOADINGS SPECIFIED BY FABRICATOR TO BE VERIFIED BY BUILDING DESIGNER**

PROVIDE ADEQUATE DRAINAGE TO PREVENT PONDING.

**BEARINGS**

JT	FACTORED		MAXIMUM FACTORED		INPUT		REQRD	
	VERT	HORZ	DOWN	HORZ	UPLIFT	IN-SX	IN-SX	
10	1701	0	1701	0	0	5-8	3-14	
15	1701	0	1701	0	0	5-8	3-14	

**UNFACTORED REACTIONS**

JT	1ST CASE		MAX. MIN. COMPONENT REACTIONS		WIND		DEAD	
	COMBINED	SNOW	LIVE					
10	1202	794 / 0	0 / 0	0 / 0	0 / 0	408 / 0		
15	1202	794 / 0	0 / 0	0 / 0	0 / 0	408 / 0		

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) 10, 15

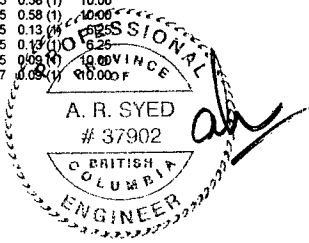
**BRACING**

TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 3.41FT.  
MAX. UNBRACED BOTTOM CHORD LENGTH = 6.25FT. OR RIGID CEILING DIRECTLY APPLIED.

**LOADING**

TOTAL LOAD CASES: (3)

MEMB.	CHORDS				WEBS			
	MAX. FACTORED FORCE (LBS)	VERT. LOAD (PLF)	LC1 (CSI (LC))	MAX (PLF)	MEMB. FORCE (LBS)	MAX (LBS)	FACTORED (CSI (LC))	MAX (CSI (LC))
FR-TO								
1-2	0 / 34	-124.2	-124.2	0.23 (1)	10.00	13-4	0 / 440	0.13 (1)
2-3	-4176 / 0	-124.2	-124.2	0.55 (1)	3.41	13-5	-567 / 0	0.30 (1)
3-4	-3630 / 0	-124.2	-124.2	0.57 (1)	3.58	12-5	-484 / 0	0.09 (1)
4-5	-3630 / 0	-124.2	-124.2	0.57 (1)	3.58	12-6	0 / 4268	0.91 (1)
5-6	-4176 / 0	-124.2	-124.2	0.55 (1)	3.41	10-6	-1692 / 0	0.23 (1)
6-7	0 / 34	-124.2	-124.2	0.23 (1)	10.00	3-13	-567 / 0	0.30 (1)
16-1	0 / 210	0.0	0.0	0.04 (1)	10.00	14-3	-484 / 0	0.09 (1)
9-7	0 / 210	0.0	0.0	0.04 (1)	10.00	2-14	0 / 4268	0.91 (1)
						15-2	-1692 / 0	0.23 (1)
17-16	0 / 0	-141.7	-141.7	0.09 (1)	10.00			
16-15	0 / 0	-17.5	-17.5	0.09 (1)	10.00			
15-14	-97 / 0	-17.5	-17.5	0.13 (1)	6.25			
14-13	0 / 4139	-17.5	-17.5	0.58 (1)	10.00			
13-12	0 / 4139	-17.5	-17.5	0.58 (1)	10.00			
12-11	-97 / 0	-17.5	-17.5	0.13 (1)	6.25			
11-10	-97 / 0	-17.5	-17.5	0.13 (1)	6.25			
10-9	0 / 0	-17.5	-17.5	0.09 (1)	10.00			
9-8	0 / 0	-141.7	-141.7	0.09 (1)	10.00			



TOTAL WEIGHT = 87 lb

**DESIGN CRITERIA**

SPECIFIED LOADS:

- TOP CH. LL = 33.1 PSF
- DL = 10.0 PSF
- BOT CH. LL = 0.0 PSF
- DL = 7.0 PSF
- TOTAL LOAD = 50.1 PSF

SPACING = 24.0 IN. / C/C

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBC 2010

THIS DESIGN COMPLIES WITH:

- PART 9 OF OBC 2012, BCBC 2012, ABC 2012
- CSA 086-09
- TPIC 2011

DESIGN ASSUMPTIONS

- PERCENTAGE OF GROUND SNOW LOAD IS USER-DEFINED.
- OVERHANG NOT TO BE ALTERED OR CUT OFF.

(55% OF 52.5 P.S.F. G.S.L. PLUS 4.2 P.S.F. RAIN LOAD EQUALS 33.1 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL. (LL) = L/360 (0.68")  
CALCULATED VERT. DEFL. (LL) = L/959 (0.22")  
ALLOWABLE DEFL. (TL) = L/360 (0.68")  
CALCULATED VERT. DEFL. (TL) = L/597 (0.41")

CANTILEVER DEFLECTION:

- ALLOWABLE DEFL. (LL) = L/207 (0.19")
- CALCULATED VERT. DEFL. (LL) = L/258 (0.08")
- ALLOWABLE DEFL. (TL) = L/360 (0.19")
- CALCULATED VERT. DEFL. (TL) = L/207 (0.15")

CSI: TC=0.57 (3-4:1), BC=0.58 (12-13:1), WB=0.91 (6-12:1), SSI=0.30 (3-4:1)

DOL LUMBER=1.00 NAIL=1.00 LS BEND=1.10  
COMP=1.10 SHEAR=1.10 TENS=1.10

COMPANION LIVE LOAD FACTOR = 0.50  
FLAT ROOF FACTOR = 0.75

TRUSS PLATE MANUFACTURER IS NOT RESPONSIBLE FOR QUALITY CONTROL IN THE TRUSS MANUFACTURING PLANT.

NAIL VALUES

PLATE	GRIP (DRY)	SHEAR	SECTION
(PSI)	(PLI)	(PLI)	(PLI)
MT20	618	354	1667
	822	2284	1656

PLATE PLACEMENT TOL. = 0.250 inches  
PLATE ROTATION TOL. = 5.0 Deg.

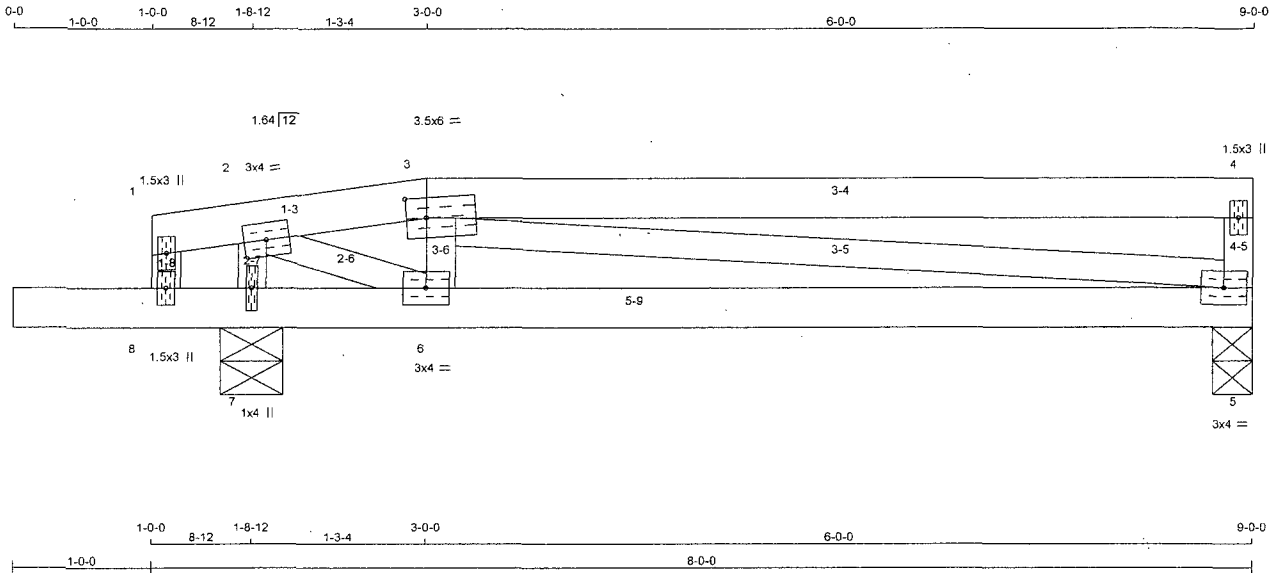
JSI GRIP = 0.90 (11) (INPUT = 0.90)  
JSI METAL = 0.93 (14) (INPUT = 1.00)

JOB NAME	TRUSS NAME	QUANTITY	PLY	JOB DESC.	130524, ALEX SONG, 14423-BLOCKBURN, WHITE ROCK	DRWG NO.
SONG1542	BA	4	1	TRUSS DESC.		

A-1 Truss (2002) Ltd, Surrey, BC, V3W 4G2

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ID:ubTaMK5rc503yp0QE6m1tAy10Oz-TKBHnDlpSJ62Zi6I?BBJG2OEJ?UJglysJXVv7ykyzof



TOTAL WEIGHT = 4 X 28 = 111 lb

**LUMBER**

N.L. G. A. RULES

CHORDS	SIZE	LUMBER	DESCR.
1 - 3	2x4	DRY	No.2
3 - 4	2x4	DRY	SS
5 - 4	2x3	DRY	No.2
8 - 1	2x3	DRY	No.2
9 - 5	2x4	DRY	No.2

ALL WEBS 2x3 DRY No.2

DRY: SEASONED LUMBER.

**PLATES (table is in inches)**

JT	TYPE	PLATES	W	LEN	Y	X
1	TMV+p	MT20	1.5	3.0		
2	TMWW-t	MT20	3.0	4.0		
3	TTWW-m	MT20	3.5	6.0	1.75	1.75
4	TMV+p	MT20	1.5	3.0		
5	BMVV1-t	MT20	3.0	4.0		
6	BMWW-t	MT20	3.0	4.0		
7	BMW1+w	MT20	1.0	4.0		
8	BMV+p	MT20	1.5	3.0		

**DIMENSIONS, SUPPORTS AND LOADINGS SPECIFIED BY FABRICATOR TO BE DESIGNED BY BUILDING DESIGNER**

PROVIDE ADEQUATE DRAINAGE TO PREVENT PONDING

**BEARINGS**

JT	FACTORED GROSS REACTION		MAXIMUM FACTORED GROSS REACTION		INPUT BRG		REQD BRG	
	VERT	HORZ	DOWN	HORZ	UPLIFT	IN-SX	IN-SX	IN-SX
5	486	0	486	0	3-8	1-8		
7	789	0	789	0	0	5-8	1-8	

**UNFACTORED REACTIONS**

JT	1ST LCASE		MAX/MIN COMPONENT REACTIONS		WIND	DEAD
	COMBINED	SNOW	LIVE			
5	343	227/0	0/0	0/0	117/0	
7	558	368/0	0/0	0/0	189/0	

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) 7

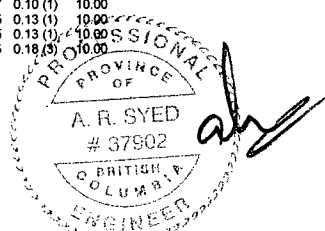
**BRACING**

TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 6.25FT.  
MAX. UNBRACED BOTTOM CHORD LENGTH = 10.00FT. OR RIGID CEILING DIRECTLY APPLIED.

**LOADING**

TOTAL LOAD CASES: (3)

MEMB.	FR-TO	CHORDS			WEBS			
		MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD (PLF)	LC1 MAX (LC)	MEMB. UNBRAC (LBS)	MAX. FACTORED FORCE (LBS)	MAX. CSI (LC)	
1-2	0/22		-124.2	-124.2	0.17 (1)	10.00	7-2 -690/0	0.10 (1)
2-3	-527/0		-124.2	-124.2	0.17 (1)	6.25	2-6 0/561	0.13 (1)
3-4	0/0		-124.2	-124.2	0.54 (1)	10.00	6-3 -224/0	0.03 (1)
5-4	-373/0		0.0	0.0	0.05 (1)	7.81	3-5 -485/0	0.29 (1)
8-1	0/119		0.0	0.0	0.03 (1)	10.00		
9-8	0/0		-141.7	-141.7	0.10 (1)	10.00		
8-7	0/0		-17.5	-17.5	0.13 (1)	10.00		
7-6	0/0		-17.5	-17.5	0.13 (1)	10.00		
6-5	0/481		-17.5	-17.5	0.18 (1)	10.00		



**DESIGN CRITERIA**

**SPECIFIED LOADS:**  
TOP CH. LL = 33.1 PSF  
DL = 10.0 PSF  
BOT CH. LL = 0.0 PSF  
DL = 7.0 PSF  
TOTAL LOAD = 50.1 PSF

SPACING = 24.0 IN. C/C

LOADING IN FLAT SECTION BASED ON A SLOPE OF 6.00/12

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBC 2010

THIS DESIGN COMPLIES WITH:

- PART 9 OF OBC 2012, BCBC 2012, ABC 2012
- CSA 086-09
- TPIC 2011

**DESIGN ASSUMPTIONS**

- PERCENTAGE OF GROUND SNOW LOAD IS USER-DEFINED.
- OVERHANG NOT TO BE ALTERED OR CUT OFF.

(55% OF 52.5 P.S.F. G.S.L. PLUS 4.2 P.S.F. RAIN LOAD EQUALS 33.1 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL) = L/360 (0.24")  
CALCULATED VERT. DEFL.(LL) = L/999 (0.01")  
ALLOWABLE DEFL.(TL) = L/360 (0.24")  
CALCULATED VERT. DEFL.(TL) = L/999 (0.05")

**CANTILEVER DEFLECTION:**

ALLOWABLE DEFL.(LL) = L/207 (0.19")  
CALCULATED VERT. DEFL.(LL) = L/999 (0.01")  
ALLOWABLE DEFL.(TL) = L/360 (0.19")  
CALCULATED VERT. DEFL.(TL) = L/999 (0.01")

CSI: TC=0.54 (3-4:1), BC=0.18 (5-6:3), WB=0.29 (3-5:1), SSI=0.23 (3-4:1)

DOL LUMBER=1.00 NAIL=1.00 LS BEND=1.10  
COMP=1.10 SHEAR=1.10 TENS=1.10

COMPANION LIVE LOAD FACTOR = 0.50

AUTOSOLVE RIGHT HEEL ONLY

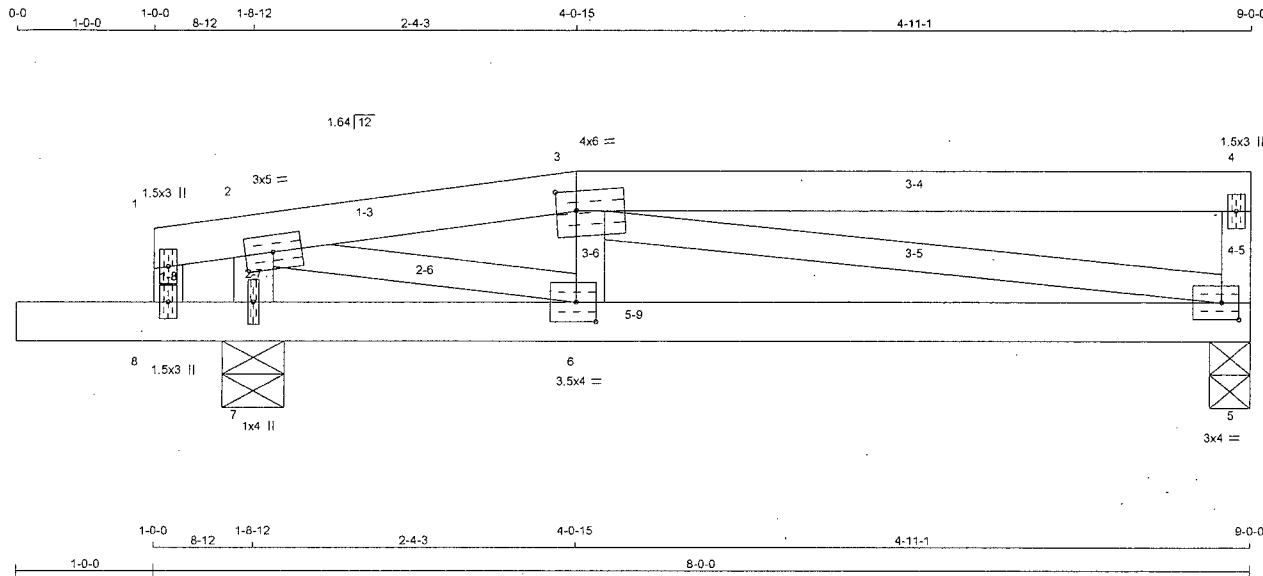
TRUSS PLATE MANUFACTURER IS NOT RESPONSIBLE FOR QUALITY CONTROL IN THE TRUSS MANUFACTURING PLANT.

**NAIL VALUES**  
PLATE GRIP(DRY) SHEAR SECTION (PSI) (PL) (PL)  
MAX MIN MAX MIN MAX MIN  
MT20 618 354 1667 822 2284 1656

PLATE PLACEMENT TOL. = 0.250 inches

PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.83 (6) (INPUT = 0.90)  
JSI METAL= 0.25 (7) (INPUT = 1.00)



TOTAL WEIGHT = 4 X 27 = 107 lb

**LUMBER**

N. L. G. A. RULES

CHORDS	SIZE	LUMBER
1 - 3	2x4	DRY No.2
3 - 4	2x4	DRY No.2
5 - 4	2x3	DRY No.2
8 - 1	2x3	DRY No.2
9 - 5	2x4	DRY No.2

ALL WEBS 2x3 DRY No.2 EXCEPT

7 - 2 2x4 DRY No.2

DRY: SEASONED LUMBER.

**PLATES (table is in inches)**

JT	TYPE	PLATES	W	LEN	Y	X
1	TMV+p	MT20	1.5	3.0		
2	TMWW-t	MT20	3.0	5.0		
3	TTWW-m	MT20	4.0	6.0	1.75	1.75
4	TMV+p	MT20	1.5	3.0		
5	BMWW-t	MT20	3.0	4.0	1.50	1.50
6	BMWW-t	MT20	3.5	4.0	1.75	1.75
7	BMV1-w	MT20	1.0	4.0		
8	BMV+p	MT20	1.5	3.0		

**DIMENSIONS, SUPPORTS AND LOADINGS SPECIFIED BY FABRICATOR TO BE VERIFIED BY BUILDING DESIGNER**

PROVIDE ADEQUATE DRAINAGE TO PREVENT PONDING.

**BEARINGS**

FACTORED GROSS REACTION	MAXIMUM FACTORED GROSS REACTION	INPUT BRG	REQRD BRG
JT VERT	HORZ	DOWN	HORZ
5	486	0	486
7	789	0	789

**UNFACTORED REACTIONS**

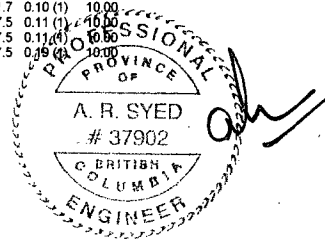
1ST LCASE	SNOW	LIVE	WIND	DEAD
JT COMBINED				
5	343	227 / 0	0 / 0	17 / 0
7	558	368 / 0	0 / 0	89 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S)

**BRACING**  
TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 6.25 FT.  
MAX. UNBRACED BOTTOM CHORD LENGTH = 10.00 FT. OR RIGID CEILING DIRECTLY APPLIED.

**LOADING**  
TOTAL LOAD CASES: (3)

CHORDS				WEBS			
MEMB.	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD (PLF)	LC1 MAX CSI (LC)	MAX UNBRAC LENGTH	MEMB.	MAX. FACTORED FORCE (LBS)	MAX CSI (LC)
FR-TO		FROM TO			FR-TO		
1-2	0 / 25	-124.2 -124.2	0.19 (1)	10.00	7-2	-714 / 0	0.07 (1)
2-3	-724 / 0	-124.2 -124.2	0.19 (1)	6.25	2-6	0 / 733	0.16 (1)
3-4	0 / 0	-124.2 -124.2	0.51 (1)	10.00	6-3	-163 / 4	0.02 (1)
5-4	-306 / 0	0.0	0.0	0.04 (1)	7.81	3-5	-705 / 0
8-1	0 / 138	0.0	0.0	0.03 (1)	10.00		0.27 (1)
9-8	0 / 0	-141.7 -141.7	0.10 (1)	10.00			
8-7	0 / 0	-17.5 -17.5	0.11 (1)	10.00			
7-6	0 / 0	-17.5 -17.5	0.11 (1)	10.00			
6-5	0 / 692	-17.5 -17.5	0.19 (1)	10.00			



**DESIGN CRITERIA**

**SPECIFIED LOADS:**

TOP CH. LL	= 33.1 PSF
DL	= 10.0 PSF
BOT CH. LL	= 0.0 PSF
DL	= 7.0 PSF
TOTAL LOAD	= 50.1 PSF

**SPACING = 24.0 IN. C/C**

LOADING IN FLAT SECTION BASED ON A SLOPE OF 6.00/12

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBC 2010

THIS DESIGN COMPLIES WITH:  
- PART 9 OF OBC 2012, BCBC 2012, ABC 2012  
- CSA 086-09  
- TPIC 2011

**DESIGN ASSUMPTIONS**  
- PERCENTAGE OF GROUND SNOW LOAD IS USER-DEFINED.  
- OVERHANG NOT TO BE ALTERED OR CUT OFF.

(55% OF 52.5 P.S.F. G.S.L. PLUS 4.2 P.S.F. RAIN LOAD EQUALS 33.1 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL. (LL)	= L/360 (0.24")
CALCULATED VERT. DEFL. (LL)	= L/999 (0.02")
ALLOWABLE DEFL. (TL)	= L/360 (0.24")
CALCULATED VERT. DEFL. (TL)	= L/999 (0.05")

**CANTILEVER DEFLECTION:**  
ALLOWABLE DEFL. (LL) = L/207 (0.19")  
CALCULATED VERT. DEFL. (LL) = L/999 (0.01")  
ALLOWABLE DEFL. (TL) = L/360 (0.19")  
CALCULATED VERT. DEFL. (TL) = L/999 (0.01")

CSI: TC=0.51 (3-4:1), BC=0.19 (5-6:1), WB=0.27 (3-5:1), SSI=0.24 (3-4:1)

DOL LUMBER=1.00 NAIL=1.00 LS BEND=1.10 COMP=1.10 SHEAR=1.10 TENS=1.10

COMPANION LIVE LOAD FACTOR = 0.50

AUTOSOLVE RIGHT HEEL ONLY

TRUSS PLATE MANUFACTURER IS NOT RESPONSIBLE FOR QUALITY CONTROL IN THE TRUSS MANUFACTURING PLANT.

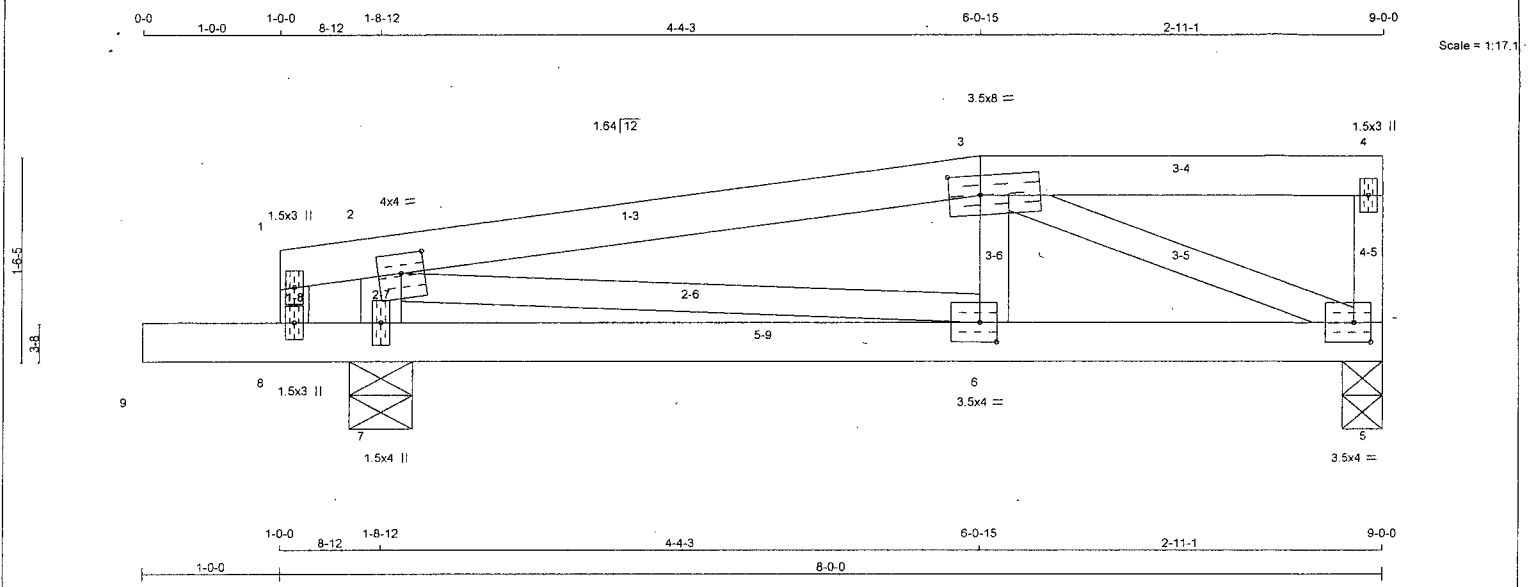
**NAIL VALUES**

PLATE	GRIP (DRY) (PSI)	SHEAR (PLI)	SECTION (PLI)
MT20	618	354	1667
	822	2284	1656

PLATE PLACEMENT TOL = 0.250 inches

PLATE ROTATION TOL = 5.0 Deg.

JSI GRIP= 0.86 (3) (INPUT = 0.90)  
JSI METAL= 0.26 (7) (INPUT = 1.00)



TOTAL WEIGHT = 4 X 27 = 109 lb

**LUMBER**

N. L. G. A. RULES

CHORDS	SIZE	LUMBER	DESCR.
1 - 3	2x4	DRY No.2	SPF
3 - 4	2x4	DRY No.2	SPF
5 - 4	2x3	DRY No.2	SPF
8 - 1	2x3	DRY No.2	SPF
9 - 5	2x4	DRY No.2	SPF
ALL WEBS EXCEPT 7 - 2	2x3	DRY No.2	SPF
	2x4	DRY No.2	SPF

DRY: SEASONED LUMBER.

**PLATES (tables in inches)**

JT	TYPE	PLATES	W	LEN	Y	X
1	TMV+p	MT20	1.5	3.0		
2	TMWW-t	MT20	4.0	4.0	1.75	2.00
3	TTWW-m	MT20	3.5	8.0	1.75	2.75
4	TMV+p	MT20	1.5	3.0		
5	BMVW1-t	MT20	3.5	4.0	1.75	1.50
6	BMWW-t	MT20	3.5	4.0	1.75	1.50
7	BMV1+w	MT20	1.5	4.0		
8	BMV+p	MT20	1.5	3.0		

**DIMENSIONS, SUPPORTS AND LOADINGS SPECIFIED BY FABRICATOR TO BE VERIFIED BY BUILDING DESIGNER**

**BEARINGS**

PROVIDE ADEQUATE DRAINAGE TO PREVENT PONDING.

JT	FACTORED GROSS REACTION	MAXIMUM FACTORED GROSS REACTION	INPUT BRG	REQRD BRG
5	VERT 486	DOWN 486	0	3-8
7	HORZ 789	HORZ 789	0	5-8

**UNFACTORED REACTIONS**

JT	1ST CASE COMBINED	MAX SNOW	MIN LIVE	WIND	DEAD
5	343	227/0	0/0	0/0	117/0
7	558	368/0	0/0	0/0	189/0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) 7

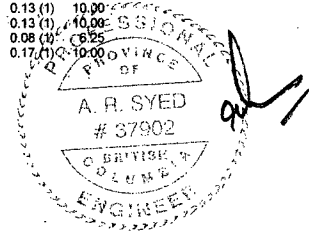
**BRACING**

TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 6.25FT.  
 MAX. UNBRACED BOTTOM CHORD LENGTH = 6.25FT. OR RIGID CEILING DIRECTLY APPLIED.

**LOADING**

TOTAL LOAD CASES: (3)

CHORDS				WEBS			
MEMB.	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD (PLF)	MAX LCL1 (CSI (LC))	MAX UNBRAC LENGTH (FR-TO)	MEMB.	MAX. FACTORED FORCE (LBS)	MAX UNBRAC LENGTH (FR-TO)
1-2	0/41	-124.2	-124.2	0.39 (1)	10.00	7-2	-857/0
2-3	-682/0	-124.2	-124.2	0.40 (1)	6.25	2-6	0/718
3-4	0/0	-124.2	-124.2	0.24 (1)	10.00	6-3	-33/42
5-4	-182/0	0.0	0.0	0.03 (1)	7.81	3-5	-723/0
8-1	0/257	0.0	0.0	0.08 (1)	10.00		
9-8	0/0	-141.7	-141.7	0.13 (1)	10.00		
8-7	0/0	-17.5	-17.5	0.13 (1)	10.00		
7-6	-42/0	-17.5	-17.5	0.08 (1)	6.25		
6-5	0/666	-17.5	-17.5	0.17 (1)	10.00		



**DESIGN CRITERIA**

**SPECIFIED LOADS:**

TOP CH. LL = 33.1 PSF  
 DL = 10.0 PSF  
 BOT CH. LL = 0.0 PSF  
 DL = 7.0 PSF  
 TOTAL LOAD = 50.1 PSF

**SPACING = 24.0 IN. C/C**

LOADING IN FLAT SECTION BASED ON A SLOPE OF 6.00/12

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBC 2010

THIS DESIGN COMPLIES WITH:  
 - PART 9 OF OBC 2012, BCBC 2012, ABC 2012  
 - CSA 086-09  
 - TPIC 2011

**DESIGN ASSUMPTIONS**

- PERCENTAGE OF GROUND SNOW LOAD IS USER-DEFINED.  
 - OVERHANG NOT TO BE ALTERED OR CUT OFF.

(55% OF 52.5 P.S.F. G.S.L. PLUS  
 4.2 P.S.F. RAIN LOAD EQUALS  
 33.1 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL) = L/360 (0.24")  
 CALCULATED VERT. DEFL.(LL) = L/999 (0.02")  
 ALLOWABLE DEFL.(TL) = L/360 (0.24")  
 CALCULATED VERT. DEFL.(TL) = L/999 (0.03")

**CANTILEVER DEFLECTION:**

ALLOWABLE DEFL.(LL) = L/207 (0.19")  
 CALCULATED VERT. DEFL.(LL) = L/999 (0.02")  
 ALLOWABLE DEFL.(TL) = L/360 (0.19")  
 CALCULATED VERT. DEFL.(TL) = L/755 (0.03")

CSI: TC=0.40 (2-3:1), BC=0.17 (5-6:1), WB=0.22 (2-6:1), SSI=0.35 (1-2:1)

DOL LUMBER=1.00 NAIL=1.00 LS BEND=1.10  
 COMP=1.10 SHEAR=1.10 TENS=1.10

COMPANION LIVE LOAD FACTOR = 0.50  
 FLAT ROOF FACTOR = 0.75

AUTOSOLVE RIGHT HEEL ONLY

TRUSS PLATE MANUFACTURER IS NOT RESPONSIBLE FOR QUALITY CONTROL IN THE TRUSS MANUFACTURING PLANT.

**NAIL VALUES**

PLATE	GRIP (DRY) (PSI)	SHEAR (PLI)	SECTION (PLI)
MT20	818	354	1667
	622	2284	1656

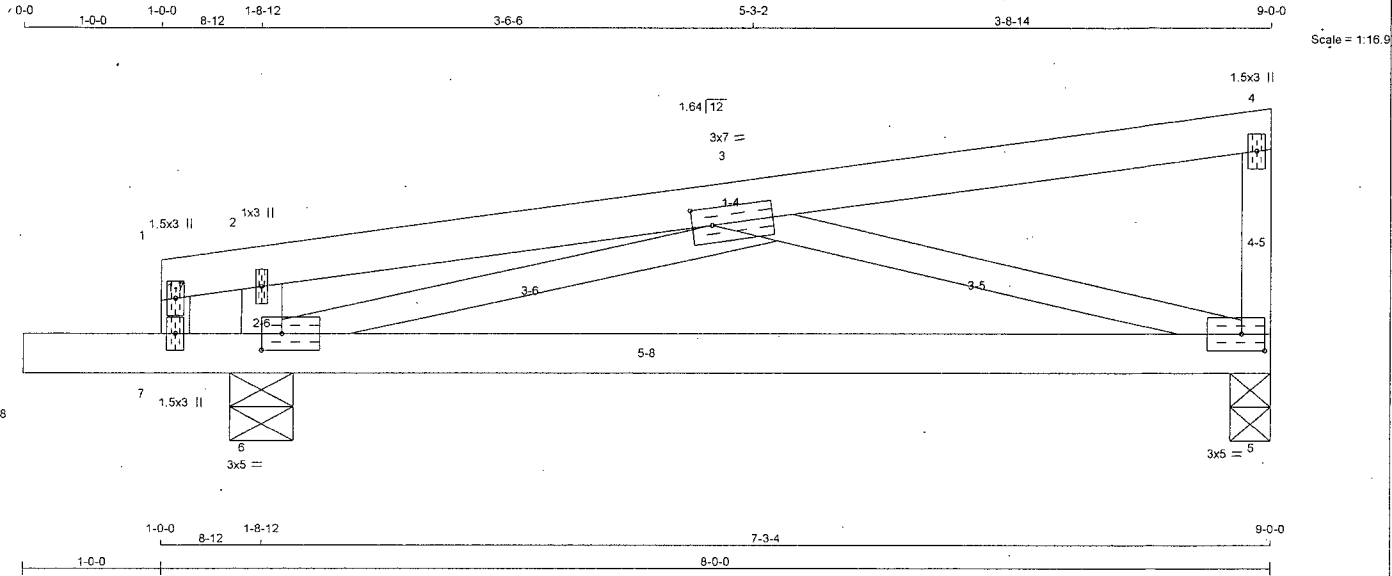
PLATE PLACEMENT TOL. = 0.250 inches

PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.84 (1) (INPUT = 0.90)  
 JSI METAL= 0.38 (2) (INPUT = 1.00)

JOB NAME <b>SONG1542</b>	TRUSS NAME <b>BD</b>	QUANTITY <b>8</b>	PLY <b>1</b>	JOB DESC. <b>130524, ALEX SONG, 14423-BLOCKBURN, WHITE ROCK</b>	DRWG NO.
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A-1 Truss (2002) Ltd, Surrey, BC, V3W 4G2 Version 7.350 S Sep 27 2012 MiTek Industries, Inc. Fri Aug 23 09:41:30 2013 Page 1  
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**LUMBER**  
N. L. G. A. RULES

CHORDS	SIZE	LUMBER	DESCR.
7 - 1	2x3 DRY	No.2	SPF
1 - 4	2x4 DRY	No.2	SPF
5 - 4	2x3 DRY	No.2	SPF
8 - 5	2x4 DRY	No.2	SPF
ALL WEBS 2x3 DRY No.2			
EXCEPT			
6 - 2	2x4 DRY	No.2	SPF

DRY: SEASONED LUMBER.

**PLATES (table is in inches)**

JT	TYPE	PLATES	W	LEN	Y	X
1	TMV+p	MT20	1.5	3.0		
2	TMW+w	MT20	1.0	3.0		
3	TMWW-t	MT20	3.0	7.0	1.50	1.75
4	TMV+p	MT20	1.5	3.0		
5	BMWW1-t	MT20	3.0	5.0	1.50	2.00
6	BMWW1-t	MT20	3.0	5.0	1.50	1.75
7	BMV+p	MT20	1.5	3.0		

**DIMENSIONS, SUPPORTS, AND LOADINGS SPECIFIED BY FABRICATOR TO BE VERIFIED BY BUILDING DESIGNER**

**BEARINGS**  
PROVIDE ADEQUATE DRAINAGE TO PREVENT PONDING.

JT	VERT	HORZ	DOWN	HORZ	UPLIFT	IN-SX	IN-SX
5	486	0	486	0	0	3-8	1-8
6	789	0	789	0	0	5-8	1-8

**UNFACTORED REACTIONS**

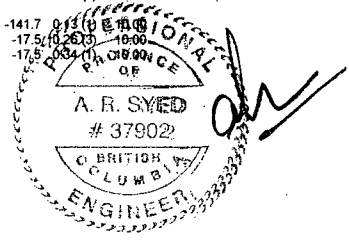
JT	1ST CASE	MAX	MIN	COMPONENT REACTIONS	
	COMBINED	SNOW	LIVE	WIND	DEAD
5	343	227 / 0	0 / 0	0 / 0	117 / 0
6	558	368 / 0	0 / 0	0 / 0	189 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) 6

**BRACING**  
TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 10.00FT.  
MAX. UNBRACED BOTTOM CHORD LENGTH = 10.00FT. OR RIGID CEILING DIRECTLY APPLIED.

**LOADING**  
TOTAL LOAD CASES: (3)

MEMB.	CHORDS			WEBS		
	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD (PLF)	MAX LC1 MAX (LC)	MAX UNBRAC LENGTH (FR-TO)	MEMB. FORCE (LBS)	MAX FACTORED CSI (LC)
7-1	-38 / 119	0.0	0.0	0.04 (1)	7.81	6-2 -418 / 0
1-2	-4 / 22	-124.2	-124.2	0.22 (1)	10.00	6-3 -856 / 0
2-3	0 / 14	-124.2	-124.2	0.26 (1)	10.00	3-5 -837 / 0
3-4	-5 / 0	-124.2	-124.2	0.28 (1)	10.00	
5-4	-197 / 0	0.0	0.0	0.04 (1)	7.81	
8-7	0 / 0	-141.7	-141.7	0.13 (1)	10.00	
7-6	0 / 0	-17.5	-17.5	0.26 (1)	10.00	
6-5	0 / 802	-17.5	-17.5	0.34 (1)	10.00	



TOTAL WEIGHT = 8 X 27 = 219 lb (M/R)

**DESIGN CRITERIA**  
SPECIFIED LOADS:  
TOP CH. LL = 33.1 PSF  
DL = 10.0 PSF  
BOT CH. LL = 0.0 PSF  
DL = 7.0 PSF  
TOTAL LOAD = 50.1 PSF

**SPACING = 24.0 IN. C/C**  
THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCS 2010  
THIS DESIGN COMPLIES WITH:  
- PART 9 OF OBC 2012, BCBC 2012, ABC 2012  
- CSA 086-09  
- TPIC 2011

**DESIGN ASSUMPTIONS**  
- PERCENTAGE OF GROUND SNOW LOAD IS USER-DEFINED.  
- OVERHANG NOT TO BE ALTERED OR CUT OFF.  
(55% OF 52.5 P.S.F. G.S.L. PLUS 4.2 P.S.F. RAIN LOAD EQUALS 33.1 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL) = L/360 (0.24")  
CALCULATED VERT. DEFL.(LL) = L/999 (0.01")  
ALLOWABLE DEFL.(TL) = L/360 (0.24")  
CALCULATED VERT. DEFL.(TL) = L/999 (0.07")  
CANTILEVER DEFLECTION:  
ALLOWABLE DEFL.(LL) = L/207 (0.19")  
CALCULATED VERT. DEFL.(LL) = L/999 (0.01")  
ALLOWABLE DEFL.(TL) = L/360 (0.19")  
CALCULATED VERT. DEFL.(TL) = L/999 (0.01")

CSI: TC=0.28 (3-4:1), BC=0.34 (5-6:1), WB=0.29 (3-5:1), SSI=0.28 (3-4:1)  
DOL LUMBER=1.00 NAIL=1.00 LS BEND=1.10  
COMP=1.10 SHEAR=1.10 TENS=1.10  
COMPANION LIVE LOAD FACTOR = 0.50  
FLAT ROOF FACTOR = 0.75

TRUSS PLATE MANUFACTURER IS NOT RESPONSIBLE FOR QUALITY CONTROL IN THE TRUSS MANUFACTURING PLANT.

**NAIL VALUES**

PLATE	GRIP(DRY)	SHEAR (PSI)	SECTION (PL)
MT20	618	354	1667 822 2284 1656

PLATE PLACEMENT TOL. = 0.250 inches  
PLATE ROTATION TOL. = 5.0 Deg.  
JSI GRIP= 0.90 (5) (INPUT = 0.90)  
JSI METAL = 0.35 (3) (INPUT = 1.00)

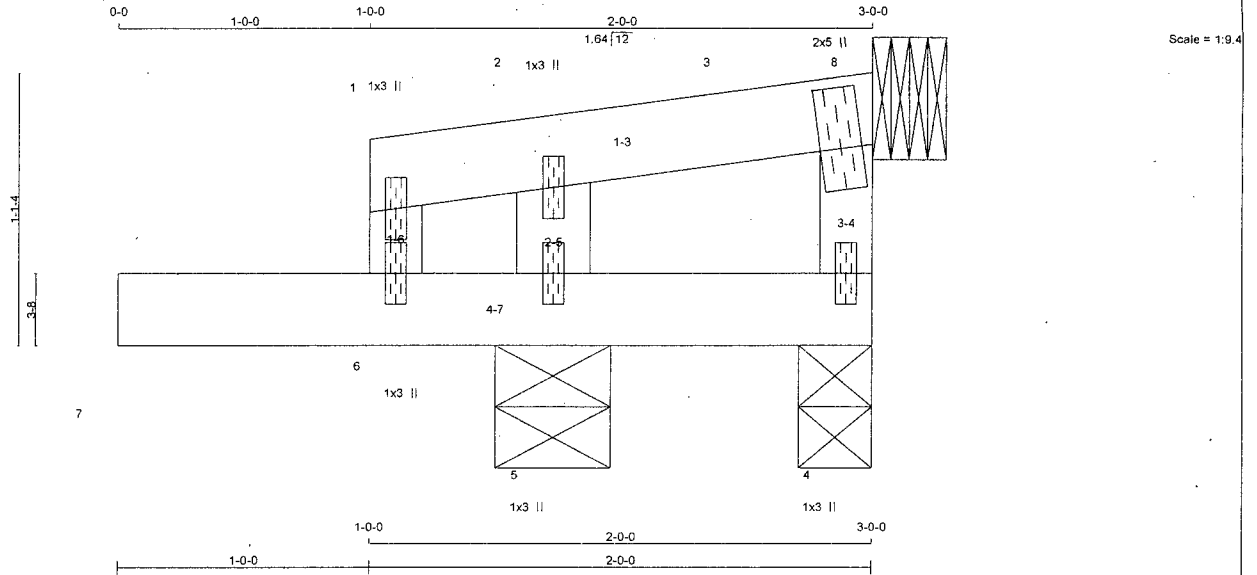


JOB NAME <b>SONG1542</b>	TRUSS NAME <b>CA</b>	QUANTITY <b>12</b>	PLY <b>1</b>	JOB DESC. <b>130524, ALEX SONG, 14423-BLOCKBURN, WHITE ROCK</b>	TRUSS DESC.	DRWG NO.
-----------------------------	-------------------------	-----------------------	-----------------	--	-------------	----------

A-1 Truss (2002) Ltd, Surrey, BC, V3W 4G2

Version 7.350 S Sep 27 2012 MiTek Industries, Inc. Fri Aug 23 09:41:30 2013 Page 1

ID:ubTaMK5rc503yp0QE6m1tAyl0Oz-ESrSFhyGUUO\_IzNjmqNxeJ\_7ZCM9YHmbTwRVoykzv3



TOTAL WEIGHT = 12 X 7 = 82 lb

**LUMBER**

N. L. G. A. RULES

CHORDS	SIZE	LUMBER	DESCR.
1 - 3	2x4	No.2	SPF
7 - 4	2x4	DRY	SPF

ALL WEBS 2x3 DRY No.2 SPF

EXCEPT 5 - 2 2x4 DRY No.2 SPF

DRY: SEASONED LUMBER.

**PLATES (table is in inches)**

JT	TYPE	PLATES	W	LEN	Y	X
1	TMW+w	MT20	1.0	3.0		
2	TMW+w	MT20	1.0	3.0		
3	TMV1+t	MT20	2.0	5.0	3.00	
4	BMW1+w	MT20	1.0	3.0		
5	BMW1+w	MT20	1.0	3.0		
6	BMW+w	MT20	1.0	3.0		

**DIMENSIONS, SUPPORTS AND LOADINGS SPECIFIED BY FABRICATOR TO BE VERIFIED BY BUILDING DESIGNER**

PROVIDE ADEQUATE DRAINAGE TO PREVENT PONDING

**BEARINGS**

JT	FACTORED GROSS REACTION		MAXIMUM FACTORED GROSS REACTION		INPUT BRG IN-SX	REQRD BRG IN-SX
	VERT	HORZ	DOWN	HORZ		
3	-76	0	0	0	5-8 (0-0)	8-4-0
4	-84	0	0	0	3-8	1-8
5	530	0	530	0	5-8	1-8

VALUE IN PARENTHESIS INDICATES EFFECTIVE BEARING LENGTH

SEE MITEK STANDARD DETAIL B36045H FOR CONNECTION TO JOINT(S) 3

PROVIDE ANCHORAGE AT BEARING JOINT 3 FOR 150 LBS. FACTORED UPLIFT

PROVIDE ANCHORAGE AT BEARING JOINT 4 FOR 150 LBS. FACTORED UPLIFT

**UNFACTORED REACTIONS**

JT	1ST LCASE		MAX. MIN. COMPONENT REACTIONS			
	COMBINED	SNOW	LIVE	WIND	DEAD	
3	-55	0/-61	0/0	0/0	0/-22	
4	-59	0/-44	0/0	0/0	0/-15	
5	374	246/0	0/0	0/0	128/0	

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) 3, 4, 5

**BRACING**

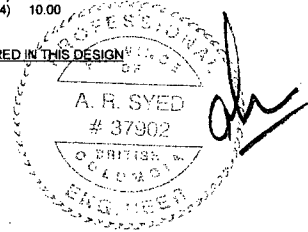
TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 6.25FT.  
MAX. UNBRACED BOTTOM CHORD LENGTH = 10.00FT. OR RIGID CEILING DIRECTLY APPLIED.

**LOADING**

TOTAL LOAD CASES: (4)

MEMB.	CHORDS		WEBS				
	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD (PLF)	LC1	MAX	UNBRAC	MEMB. FORCE (LBS)	MAX FACTORED CSI (LC)
FR-TO		FROM TO			LENGTH	FR-TO	
1-2	0/21	-124.2	-124.2	0.17 (1)	10.00	5-2	-428/0 0.04 (1)
2-3	-13/0	-124.2	-124.2	0.16 (1)	6.25	6-1	0/154 0.03 (1)
3-8	0/0	0.0	0.0	0.00 (1)	10.00	4-3	0/18 0.00 (1)
7-6	0/0	-141.7	-141.7	0.12 (1)	10.00		
6-5	0/6	-17.5	-17.5	0.13 (4)	10.00		
5-4	-8/0	-17.5	-17.5	0.13 (4)	10.00		

CANTILEVER ANALYSIS HAS BEEN CONSIDERED IN THIS DESIGN



**DESIGN CRITERIA**

SPECIFIED LOADS:

TOP CH.	LL = 33.1 PSF
	DL = 10.0 PSF
BOT CH.	LL = 0.0 PSF
	DL = 7.0 PSF
TOTAL LOAD	= 50.1 PSF

SPACING = 24.0 IN. C/C

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010;

THIS DESIGN COMPLIES WITH:

- PART 9 OF CBC 2012, BCBC 2012, ABC 2012
- CSA 086-09
- TPIC 2011

DESIGN ASSUMPTIONS

- PERCENTAGE OF GROUND SNOW LOAD IS USER-DEFINED.
- OVERHANG NOT TO BE ALTERED OR CUT OFF.

(55% OF 52.5 P.S.F. G.S.L. PLUS  
4.2 P.S.F. RAIN LOAD EQUALS  
33.1 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL. (LL) = L/360 (0.19")  
CALCULATED VERT. DEFL. (LL) = L/999 (0.00")  
ALLOWABLE DEFL. (TL) = L/360 (0.19")  
CALCULATED VERT. DEFL. (TL) = L/999 (0.00")

CANTILEVER DEFLECTION:  
ALLOWABLE DEFL. (LL) = L/188 (0.19")  
CALCULATED VERT. DEFL. (LL) = L/999 (0.02")  
ALLOWABLE DEFL. (TL) = L/360 (0.19")  
CALCULATED VERT. DEFL. (TL) = L/620 (0.03")

CSI: TC=0.17 (1-2-1), BC=0.13 (5-6-4), WB=0.04 (2-5-1), SSI=0.18 (1-2-1)

DOL LUMBER=1.00 NAIL=1.00 LS BEND=1.10  
COMP=1.10 SHEAR=1.10 TENS=1.10

COMPANION LIVE LOAD FACTOR = 0.50

AUTOSOLVE RIGHT HEEL ONLY

TRUSS PLATE MANUFACTURER IS NOT RESPONSIBLE FOR QUALITY CONTROL IN THE TRUSS MANUFACTURING PLANT.

NAIL VALUES

PLATE GRIP(DRY)	SHEAR (PSI)	SECTION (PL)
MAX MIN	MAX MIN	MAX MIN
MT20	618 354	1667 822
	2284	1656

PLATE PLACEMENT TOL. = 0.250 inches

PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.69 (2) (INPUT = 0.90)  
JSI METAL= 0.16 (5) (INPUT = 1.00)

# OPTIMUM ENGINEERING CORP.

12968-66 AVENUE, SURREY, BC V3W 7H3

Tel: (604) 700-8153 Fax: (604) 543-4035

---

Date: February 7, 2014

File: RACC0G

The City of White Rock,  
15322 Buena Vista Avenue,  
White Rock,  
BC. V4B 1Y6

**Attention: Building Inspector**

Dear Sir/Madam:

**Re: Patio Concrete Stairs Formwork for site address at: 14423-Blackburn Crescent White Rock, BC.**

We have visited the site and reviewed the formwork for patio concrete stairs at above mentioned site and noted as under:

- Reinforcement and size of stringer slab, side walls supporting steps found to be satisfactory.
- Owner/builder to not pour the concrete if ambient temperature is less than 5°C, without providing protection.
- The formwork is ready for pouring concrete.

Please contact the undersigned at 604-700-8153 in case of any further question.

Yours Truly,  
Optimum Engineering Corp.



FEB 07 2014

# OPTIMUM ENGINEERING CORP.

12968-66 AVENUE, SURREY, BC V3W 7H3

Tel: (604) 700-8153 Fax: (604) 543-4035

---

Date: February 7, 2014

File: RACC0G

The City of White Rock,  
15322 Buena Vista Avenue,  
White Rock,  
BC. V4B 1Y6

**Attention: Building Inspector**

Dear Sir/Madam:

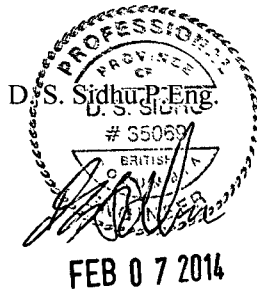
**Re: Detached Garage Structural Wood Framing at site address: 14423-Blackburn Crescent, White Rock, BC.**

We have reviewed the structural wood framing for detached garage at above mentioned site and noted as under:

- Structural wood components such as beams, headers & walls found to be satisfactory and as per BCBC 2012.
- Reaction loads of structural components have been transferred to foundation.
- Trusses found to be installed as per truss P.Eng. sign & sealed truss shop drawings.

Please contact the undersigned at 604-700-8153 in case of any further question.

Yours Truly,  
Optimum Engineering Corp.





THE CORPORATION OF THE CITY OF WHITE ROCK

PLANNING AND DEVELOPMENT SERVICES

15322 Buena Vista Avenue, White Rock, B.C. V4B 1Y6

City Hall,  
White Rock, B.C.  
Tel: 604-541-2136  
Fax: 604-541-2153

# Inspection Report

NAME: Redacted S. 22 PERMIT No.: 13.036

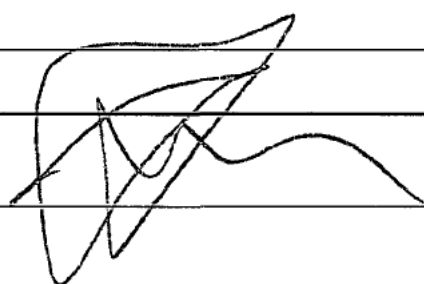
ADDRESS: 14423 Blackburn Cris SHEET No: \_\_\_\_\_

TYPE OF INSPECTION: Frame DATE: Feb 5/14

AREA OF INSPECTION: \_\_\_\_\_

- 1) Root deck stairs/access to be insulated as discussed
- 2) Fire Sprinkler pipe to be repaired c/w new 200 psi test
- 3) repair fire stop drops upper level
- 4) All waterlines on exterior walls to be frost protected.
- 5) Truss specs for garage

OK. to insulate subject to above  
Recall

SIGNATURE: \_\_\_\_\_ INSPECTOR: 

DATE: \_\_\_\_\_

Please sign this form when the work is completed and return to the above department.

# OPTIMUM ENGINEERING CORP.

12968-66 AVENUE, SURREY, BC V3W 7H3

Tel: (604) 700-8153 Fax: (604) 543-4035

---

Date: January 17, 2014

File: RACC0G

The City of White Rock,  
15322 Buena Vista Avenue,  
White Rock,  
BC. V4B 1Y6

**Attention: Building Inspector**

Dear Sir/Madam:

**Re: Structural Wood Framing at site address: 14423-Blackburn Crescent White Rock, BC.**

We have visited the site and reviewed the structural wood framing for single family dwelling at above mentioned site and noted as under:

- Structural wood components such as beams, headers, joist & walls found to be satisfactory and as per BCBC 2012.
- Reaction loads of structural components have been transferred to foundation.
- A 12" to 14" thick layer of gravel has been used under living area of basement slab.

Please contact the undersigned at 604-339-0034 in case of any further question.

Yours Truly,  
Optimum Engineering Corp.

*Beerinder Sidhu*  
B. S. Sidhu M.Eng.EIT

# C

## Mechanical Ventilation Checklist C – Distributed or Non-Distributed

Use this checklist when a centrally ducted exhaust ventilation systems such as an HRV (heat recovery ventilator) or a CEV (central exhaust ventilator) is used to meet principal fan requirements.

Civic Address 14423 Blackburn Ct- Permit No. \_\_\_\_\_

Number of Bedrooms 4 (A) A bedroom is a room with an openable window (minimum dimensions apply), a closet and a closing interior door.

Total Interior Volume of Dwelling 34200 ft<sup>3</sup> Total volume includes heated interior joist spaces and heated crawlspaces.

.5 ACH (air changes/hr) = Volume x 0.5 ÷ 60 = 285 cfm (B) Exhaust appliances exceeding .5 ACH may require make-up air.

1. Use the bedroom count from Box (A) above and Table 9.32.3.3.A. to determine the minimum Principal Exhaust Rate provided by the system.

Minimum Required Rate:

75 cfm (C)

2. HRV or CEV Equipment: Make Greentek Model 220

3A. HRV Capacity: CFM @.4"W.C. Box D must meet Box C Minimum Requirement. 200 cfm (D)

3B. CEV Capacity: CFM @.4"W.C. Box E must meet Box C Minimum Requirement.

a) The fan must be controlled either with an interval timer or run continuously:

Continuous Operation  Intermittent Operation

cfm (E)

b) The Principal Fan Rate may be set lower than its full Box E Capacity if installation is in a NAFVA home where the principal fan cfm rate must not exceed 110 cfm per 9.32.3.3.(2). If this applies, indicate fan cfm setting in Box F.

Box F must meet Box C Minimum Requirement. \_\_\_\_\_ cfm (F)

### 4. Required Kitchen and Bathroom Exhaust:

ROOM	EXHAUST RATE Required per Table 9.32.3.3.B	EXHAUST EQUIPMENT				
		Additional WALL/CEILING FANS			HRV/CEV	
		Make & Model	CFM@.2" Manf. Rated	*Duct Dia (in)		Exhaust CFM
smooth	flex					
BATHROOM	50	Brown 605	50	✓		90
h	h	h	h		h	h
h	h	h	h		h	h
h	h	h	h	✓		h
h	h	h	h	✓		h
h	h	h	h	✓		h
KIT	80			✓		h
h	h			✓		h

\* Use Table 9.32.3.9. For fan capacities exceeding Table 9.32.3.9, follow manufacturer's installation instructions or use good engineering practice to size duct. See Ventilation Guidelines Appendix pg 24-A.

TOTAL (Box D OR E) 160

Checklist C1

5. **NAFFVA** (Naturally Aspirated Fuel Fired Vented Appliance) **and/or Radon Gas present in dwelling unit?**

Yes, Proceed to Step 6 if CEV or Step 7 if HRV.  No, Omit Steps 6 to 9.

6. **CEV only—Make-Up Air Duct for Principal Fan: Choose (a) or (b) and proceed to Step 7.**

a) **Non-Distributed system—Passive make-up air duct:** Use Box E or F installed cfm and Table 9.32.3.8.

Make-up air duct diameter \_\_\_\_\_ inches. Location \_\_\_\_\_

b) **Distributed system—Active Make-Up Air Duct for Principal Fan: Per Sec 9.32.3.8. (2) (b) (ii & iii)**

Install a 4"Ø outdoor air duct into the furnace return air plenum not more than 15ft (unless a flow control device is used) or less than 10ft from the furnace cabinet. In locations with winter design temperature less than -10° C, this duct must have a motorized damper interconnected with principal ventilation air fan.

Damper make \_\_\_\_\_ Voltage \_\_\_\_\_ Interconnect in place: Principal Fan & Furnace Blower & Damper (if present)  Yes  Yes

7. **Exhaust Appliance present which exceeds Box B —0.5 ACH:**

Yes, Proceed to Step 8.  No such appliance. Omit Steps 8 to 9.

8. Use **Passive Make-up Air** for Exhaust Appliance with actual installed exhaust rate of **126 cfm or less:**

Appliance Cfm \_\_\_\_\_ Passive Make-up Air Duct Sized to Table 9.32.3.8: \_\_\_\_\_ inches

9. Use **Active Make-up Air** for Exhaust Appliance with actual installed exhaust rate of **more than 126 cfm.**

**Make-up Air Fan required:**

Fan Make \_\_\_\_\_ Model \_\_\_\_\_ \*Exhaust Appliance Cfm \_\_\_\_\_ Fan Cfm \_\_\_\_\_

Duct diameter \_\_\_\_\_ inches \*must equal actual installed exhaust rate of appliance.

Fan Location \_\_\_\_\_ Fan ducted to \_\_\_\_\_

a) **Active Make-up Air delivered to an Unoccupied Area** (not directly to room containing the appliance).

i) **Tempering Required per 9.32.4.1.(4)(a):**

Show calculation & describe how make-up air will be tempered to at least 34°F (1°C) before entering unoccupied area.

ii) **Transfer Grill Required.** Size to Table 9.32.3.8 (or 1 sq in of gross area per 2 cfm):

Transfer grill size \_\_\_\_\_ sq. in. Location \_\_\_\_\_

iii) **Additional Tempering Required per 9.32.4.1.(4)(b) before transfer to occupied area:** Show calculation and describe how make-up air will be further tempered to at least 54°F (12°C).

**OR b) Active Make-up Air delivered to an Occupied Area: Tempering Required.** Show calculation and describe how make-up air will be tempered to at least 54°F (12°C).

**Installer Certification:**

Date \_\_\_\_\_

I hereby certify that the design and installation of the ventilation system complies with the 2006 B.C. Building Code.

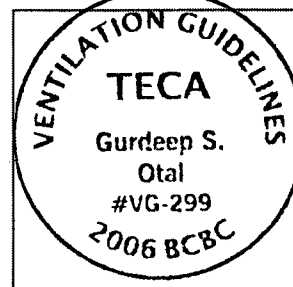
Print Name G.S. Ota

2006 TECA Ventilation Certification Stamp

Signature [Signature]

Company Omni Gas Ltd

Phone 778-882-3071



Checklist C2

## **FKL Engineering Consultants Ltd.**

3571 Worthington Dr.  
Vancouver, BC, V5M 3Y1  
(c) (604) 618-0438

29 Jan., 2014

To:  
The Building Official  
City of White Rock  
City Hall, 15322 Burna Vista  
White Rock, B.C.

### **Re : 14423 Blackburn Cres., White Rock** (Sprinkler rough-in piping inspection report)

Please be advised that we have visited the above mentioned site and inspected the rough in installation of the sprinkler system. The system as installed substantially conforms to the design drawings as submitted to the municipality.

- Rough-in piping, OK
- Coverage, OK
- Box insulation, OK
- Hydrostatic Pressure test to 200 psi, OK

OK to cover.

Yours truly,



Fred Lee, P.Eng.



# Fire Sprinkler Flow Verification Report

**Address: 14423 Blackburn Cres., White Rock**

FR 9112 (1754)

Sprinkler Permit Number :	
Installation Contractor :	NewTech Fire Protection, 778-999-7854
Date Tested :	20-Jan-14

<b>Criteria :</b>	
<ul style="list-style-type: none"> <li>- System flow meets NFPA 13D requirements.</li> <li>- System flow performed to listed sprinkler manufacturer's specifications.</li> <li>- System (one/two head flow) meets or exceeds the required flow during summer low pressure.</li> <li>- A dual check valve is installed.</li> </ul>	
<b>Method :</b>	
<ul style="list-style-type: none"> <li>- In accordance with City of Vancouver Bulletin 91-9, Sprinkler Flow Verification Test for One and Two Family Dwellings.</li> <li>- Flush and drain the system at the station. Remove the two most remote heads (identified by the sprinkler system designer) and install gauge &amp; test piping assemblies containing sprinkler orifices of the exact type specified for the system.</li> <li>- Flush the system again at the two remote head locations for about 15 seconds without any sprinkler orifice attached.</li> <li>- Reinstall the sprinkler orifices, allow flow from the most remote head into the test bucket for 30 seconds, record static and residual pressures, and quantity of water in the test bucket.</li> <li>- Repeat the procedure for the two most remote sprinkler heads simultaneously.</li> <li>- Calculate the Adjusted Flow at summer low pressure and determine if test results meet the system design criteria.</li> </ul>	

<b>Information:</b>					
Winter Static (psi)	Summer Static (psi)	Estimated Residual (psi)	Fire Booster Pump	Valve Installed	
	70	61	psi ( @ 36 usgpm )	na	yes

## One Head Flow ( 30 seconds )

<b>Listed Sprinkler Specification :</b>								
Test Head	Make	Model	Type	K Factor	Coverage (ftxft)	Min. Required Flow/Pressure (usgpm @ psi)		
#1	Tyco LFI	Ty2334	Sidewall	4.4	14x14	14@10.2		
<b>Field Measurement &amp; Adjusted Flow</b>								
	Gauge Height above City Conn. (ft)	Static Gauge (psi)	Static Gauge with Pump (psi)	Residual Gauge (psi)	Water Flowed (litre)	Measured Flow (usgpm)	Adjusted Flow (usgpm)	Test Result
		72	NA	30	47	24.8	24.8	Passed

## Two Head Flow ( 30 seconds )

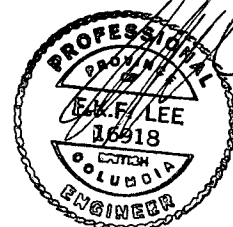
<b>Listed Sprinkler Specification :</b>								
Test Head	Make	Model	Type	K Factor	Coverage (ftxft)	Min. Required Flow/Pressure (usgpm @ psi)		
#1	Tyco LFI	Ty2334	Sidewall	4.4	14x14	14@10.2		
#2	Tyco LFI	Ty2334	Sidewall	4.4	14x14	14@10.2		
<b>Field Measurement &amp; Adjusted Flow</b>								
	Gauge Height above City Conn. (ft)	Static Gauge (psi)	Static Gauge with Pump (psi)	Residual Gauge (psi)	Water Flowed (litre)	Measured Flow (usgpm)	Adjusted Flow (usgpm)	Test Result
#1		72	NA	15	33	17.4	17.4	Passed
#2		72	NA	14	31	16.4	16.4	Passed

### **FKL Engineering Consultants Ltd.**

3571 Worthington Dr.,  
 Vancouver, BC, V5M 3Y1  
 Tel : (604) 618-0438  
 Fax: (604) 435-3181

Dated : 29-Jan-14

Quality System Manager



This report may not be reproduced excepted in full and with prior written approval from FKL Engineering Consultants Ltd.

**FKL Engineering Consultants Ltd. is accredited by the Standards Council of Canada as a testing laboratory for Sprinkler Flow Verification Test for One & Two Family Dwellings**



THE CORPORATION OF THE CITY OF WHITE ROCK

PLANNING AND DEVELOPMENT SERVICES

15322 Buena Vista Avenue, White Rock, B.C. V4B 1Y6

City Hall,  
White Rock, B.C.  
Tel: 604-541-2136  
Fax: 604-541-2153


# Inspection Report

NAME: Redacted S. 22 PERMIT No.: 13-036  
 ADDRESS: 14423 Blackburn Cres SHEET No: \_\_\_\_\_  
 TYPE OF INSPECTION: Fire Sprinkler DATE: Jan 30/14  
 AREA OF INSPECTION: \_\_\_\_\_

200 psi test witnessed.

- 1) O.K. to cover report required
- 2) Flow verification report "
- 3) All electrical wiring & F.S. pipe to be separated with batt insulation & rad taped.

Recall

SIGNATURE: \_\_\_\_\_ INSPECTOR:   
 DATE: \_\_\_\_\_

Please sign this form when the work is completed and return to the above department.



THE CORPORATION OF THE CITY OF WHITE ROCK

PLANNING AND DEVELOPMENT SERVICES

15322 Buena Vista Avenue, White Rock, B.C. V4B 1Y6

City Hall,  
White Rock, B.C.  
Tel: 604-541-2136  
Fax: 604-541-2153

# Inspection Report

NAME: Redacted S. 22

PERMIT No.: 13-036

ADDRESS: 14423 Blackburn

SHEET No: \_\_\_\_\_

TYPE OF INSPECTION: Plumbing

DATE: Jan 10/14

AREA OF INSPECTION: \_\_\_\_\_

200 psi test witnessed  
waterlines around  
trap test witnessed  
Rst/Dak drains tested

\* Site to be cleaned up before further inspections can take place

SIGNATURE: \_\_\_\_\_

INSPECTOR: 

DATE: \_\_\_\_\_

Please sign this form when the work is completed and return to the above department.



THE CORPORATION OF THE CITY OF WHITE ROCK

15322 Buena Vista Avenue, White Rock, B.C. V4B 1Y6

Telephone: (604) 541-2136 Fax: (604) 541-2153

Permit Number: 6611

Date: Dec 12/13

APPLICATION FOR PLUMBING/SPRINKLER PERMIT

Location of Work: 14423 Blackburn Crs. Occupancy: SFD. Type of Work: New [X] Existing [ ] Additional [ ]

Owner: Phone: T.Q. Number: 00063 SF 11

Contractor: Newtech Fireprotection Phone: 778-999-7854 Business Licence: Yes [X] No: Applied For:

Table with columns: Floor, Water Heater, Urinals, Water Closets, Wash Basins, Bath Tubs, Showers, Kitchen Sink, Bar Sink, Dish Washer, Wash Tubs, Automatic Washer, Floor Drains, Hose Bibs, Sump, Double Check Valve, Sprinklers, Other Fixtures. Rows include Basement, Main, Second, Third, Fourth, Fifth, Sixth, and TOTAL. Includes handwritten counts for Sprinklers (8, 13, 16) and fixture unit calculations.

Water Service Size: 1 1/2 Total Fixture Units: 37 Total No. of Fixtures: 37 PERMIT FEE: \$127.00

Signature (Applicant) And I agree to conform to all requirements of the "City of White Rock Building By Law" Signature (Building Official)

COMMENTS:



THE CORPORATION OF THE CITY OF WHITE ROCK

PLANNING AND DEVELOPMENT SERVICES

15322 Buena Vista Avenue, White Rock, B.C. V4B 1Y6

City Hall,  
White Rock, B.C.  
Tel: 604-541-2136  
Fax: 604-541-2153

# Inspection Report

NAME: Redacted S. 22

PERMIT No.: 13.036

ADDRESS: 14423 Blackburn Cras

SHEET No: \_\_\_\_\_

TYPE OF INSPECTION: Ext Frame

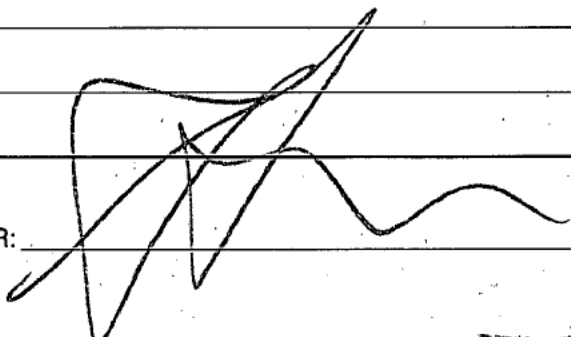
DATE: Oct 29/13

AREA OF INSPECTION: \_\_\_\_\_

- 1) Roof deck staircase + roof over to be ventilated "or" Insulate above sheeting
- 2) Roofing report required.
- 3) plumbing vents to be removed from roof deck area

Recall

SIGNATURE: \_\_\_\_\_

INSPECTOR: 

DATE: \_\_\_\_\_

Please sign this form when the work is completed and return to the above department.



THE CORPORATION OF THE CITY OF WHITE ROCK

PLANNING AND DEVELOPMENT SERVICES  
15322 Buena Vista Avenue, White Rock, B.C. V4B 1Y6

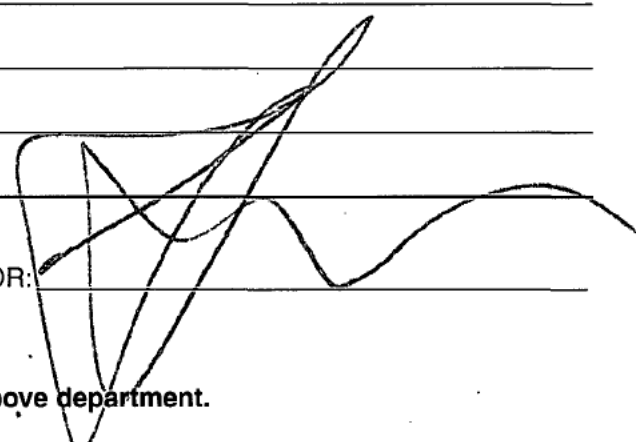
City Hall,  
White Rock, B.C.  
Tel: 604-541-2136  
Fax: 604-541-2153

# Inspection Report

NAME: Redacted S. 22 PERMIT No.: 13.026  
ADDRESS: 14423 Blackburn SHEET No.: \_\_\_\_\_  
TYPE OF INSPECTION: Ply DATE: Sept 26/13  
AREA OF INSPECTION: \_\_\_\_\_

6 mil poly  
perimeters caulked  
penetrations sealed,  
R12 rigid insulation  
2x4 PT Thermal break

Approved

SIGNATURE: \_\_\_\_\_ INSPECTOR:   
DATE: \_\_\_\_\_

Please sign this form when the work is completed and return to the above department.



THE CORPORATION OF THE CITY OF WHITE ROCK

PLANNING AND DEVELOPMENT SERVICES  
15322 Buena Vista Avenue, White Rock, B.C. V4B 1Y6

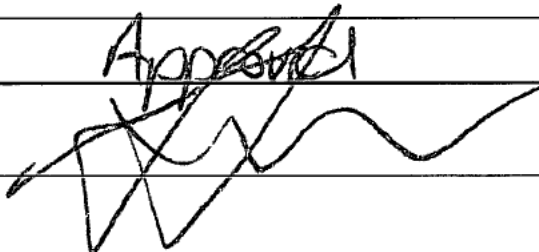
City Hall,  
White Rock, B.C.  
Tel: 604-541-2136  
Fax: 604-541-2153

# Inspection Report

NAME: Redacted S. 22 PERMIT No.: 13.034  
 ADDRESS: 14423 Blackburn SHEET No.: \_\_\_\_\_  
 TYPE OF INSPECTION: Height DATE: Sept 17/13  
 AREA OF INSPECTION: \_\_\_\_\_

House	Maximum permitted height	38.71 m
basement	0	81.10
main	132	7.61 m
upper ply	123	(299.5 inches)
deck guards	42	
	297	
	2 1/4 inches under maximum height	

Garage	Maximum permitted height	85.40 m
walls	109	81.79
truss	30	3.61 m
	139	(142.25 inches)
	3/4 inches under maximum height	

SIGNATURE: \_\_\_\_\_ INSPECTOR:   
 DATE: \_\_\_\_\_

Please sign this form when the work is completed and return to the above department.





THE CORPORATION OF THE CITY OF WHITE ROCK

PLANNING AND DEVELOPMENT SERVICES

15322 Buena Vista Avenue, White Rock, B.C. V4B 1Y6

City Hall,  
White Rock, B.C.  
Tel: 604-541-2136  
Fax: 604-541-2153

# Inspection Report

Redacted S. 22

NAME: \_\_\_\_\_

PERMIT No.: 13-036

ADDRESS: 14423 Blackburn

SHEET No: \_\_\_\_\_

TYPE OF INSPECTION: plumbing

DATE: Sept 16/13

AREA OF INSPECTION: DWR

\* Maximum permitted height to be verified -  
call for height check inspection

Above + below slab DWR Approved

Recall for poly

SIGNATURE: \_\_\_\_\_

INSPECTOR: 

DATE: \_\_\_\_\_

Please sign this form when the work is completed and return to the above department.



## Project Reference Sheet

Thermal Environmental Comfort Association of BC  
TECA Hydronic Technical Committee, July 2009

DATE: AUG 7, 13 REVISION: \_\_\_\_\_ Job # \_\_\_\_\_

TECA Hydronic Designer Stamp

CONTRACTOR: DELTA PUMPING

SUBMITTED BY: VISION DESIGNS TECA CERT # 02-222

PROJECT: 14423 BLACKBURN CRES. WHITE ROCK

Hydronic System Designer  
#02-222  
Loveleen Atwal  
*[Signature]*  
Signature

### System Summary & Schedule

System Drawing Number

PK651

PUMP SCHEDULE			
No.	MODEL	GPM	Ft/Hd
P1	W1WFX16	6.06	4.01
P2	✓	✓	10.66
P3	✓	6.00	4.11

BOILER LOAD SUMMARY			
SYSTEM	LOAD	ΔT	SUPPLY TEMP
Baseboard			
Radiant	60591	20	132°F
Domestic	60000	20	170°F
Fan Coil			
Hot Tub			
Pool			
Other			

### Pipe Carrying Capacities at 20°F

Note: Flows based on Max 4 feet head loss/100 ft (500 milinch), velocity of 2-4 fps

**Table 1: Type "M" Copper Pipe**

Size	BTU/Hr	KW	USGpm	V/fps
1/2"	16,000	4.5	1.60	2.00
3/4"	38,000	11	3.80	2.40
1"	75,000	22	7.50	2.75
1-1/4"	120,000	35	12.0	2.95
1-1/2"	200,000	58	20.0	3.50
2"	400,000	118	40.0	4.05

**Table 2: Schedule 40 Steel Pipe**

Size	BTU/Hr	KW	USGpm	V/fps
1/2"	14,000	4	1.4	1.47
3/4"	32,000	9	3.2	1.90
1"	60,000	18	6	2.25
1-1/4"	120,000	35	12	2.55
1-1/2"	180,000	53	18	2.80
2"	360,000	105	36	3.45

**Table 3: Crosslinked Polyethylene Pipe**

Size	BTU/Hr	KW	USGpm	V/fps
1/2"	12,000	3.5	1.20	2.10
5/8"	18,000	5	1.80	2.25
3/4"	28,000	8	2.80	2.50
1"	55,000	16	5.50	2.95
1-1/4"	90,000	26	9.00	3.20
1-1/2"	140,000	41	14.00	3.60
2"	300.00	88	30.00	4.50

### Important System Notes

1. The temperature control device shall be automatically controlled using a supply water temperature sensor.
2. Purge valve assembly may be located as shown or in other effective location.
3. A pressure relief bypass valve is required if circulator can operate when all zone valves are closed. Pressure relief bypass shall be sized for a minimum of 30% of the system flow.
4. Automatic make-up water may not be required if low-water cut-off is used.
5. All injection piping to be sized as per manufacturer instructions.

6. A properly sized pressure relief valve to be installed as per code requirements.
7. Injection control may be by on/off pump, motorized zone valve or non-electric valve with controller.
8. Individual zone control may be accomplished with the use of zone valves or circulators.
9. In case a low water temperature condition exists, an aquastat or control sensor to close down the low temperature heating zones until return water temperature reaches acceptable limits must be used.
10. Flow through manifolds (such as those used in radiant heating systems) may be controlled by zone valves,

- circulators or individual loop actuating motors.
11. If boiler is not supplied with a manufacturer installed temperature gauge, a suitable temperature gauge must be installed in the outlet piping of the boiler.
12. Steps must be taken to prevent thermal circulation from occurring in all secondary circuits of a primary/secondary system by using either check valves or heat traps (or a combination of these devices).
13. Primary pump may be located as shown or may be located in the primary loop after the secondary system piping take-off.

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CITY OF WHITE ROCK  
DEVELOPMENT SERVICES

**LEGEND**

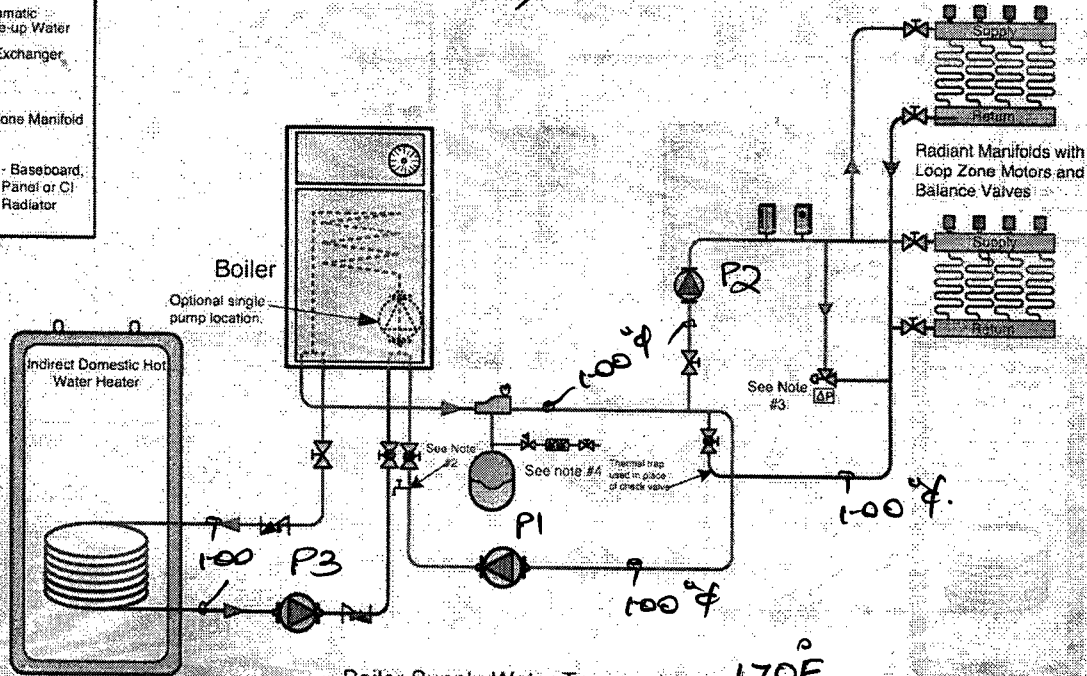
- Zone Valve
- Circuit Balance Valve
- Shut Off Valve
- Bypass Valve
- Relief Valve
- S/C Valve
- Spring Loaded Check Valve
- 3-Way Mix Valve
- 4-Way Mix Valve
- Injection Valve or Pump
- 3-Way Diverting Mix Valve
- Air Purger/ Eliminator
- Safety High Limit
- Thermometer
- Pressure Gauge
- Circulator
- Expansion Tank
- Automatic Make-up Water
- Heat Exchanger
- Zone Manifold
- Baseboard, Panel or CI Radiator

Primary/Secondary Piping System for Boilers with separate Connections for Indirect DHW with Direct Return Piping with Radiant Heating System  
No Mixing System

JOB: 14423 BLACKBURN CRES. WHITE ROCK

Hydronic System Design  
#02-222  
Loyleen Atwa  
*[Signature]*  
Signature

Indirect Hot Water Heater	
Make:	HEATFLOW
Model:	60
Storage Capacity:	60 gal
Priority:	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No



Note: If heater delivery temperature is above 140°F a suitable tempering valve is required to regulate the domestic water outlet temperature.

Boiler Supply Water Temperature: 170°F

Boiler Minimum Return Water Temperature: N/A

NOTE: Boilers used in radiant heating systems without the use of mixing controls must be approved for condensing operation by the manufacturer and CSA. The venting system must also be approved for condensing operation. The boiler should utilize a control system to ensure higher than required radiant temperature does not enter the radiant system.

NOTE: This Primary/Secondary piping drawing illustrates some of the common methods of piping to eliminate thermal flow in secondary system by either the use of check valves, thermal traps, positive shut off zone valves or a combination of these methods. One of these methods should be used in all primary/secondary piping systems to prevent thermal flow in the secondary systems when there is no call for heat.

NOTE: Secondary Loads should be taken off Primary Circuit in order of their required supply temperatures (Highest temperature load first)

NOTE: This diagram illustrates a general arrangement and may not show all the necessary components and accessories that can be utilized or required for the proper operation of the system or that may be required by local codes.

Boiler Information	
Make:	VEISSMAN
Model:	WB1B26
Input:	37-91 MBH
Output:	34-83 MBH

Thermal Environmental Comfort Association of BC Hydronics Technical Committee © 2009	
Drawing #	PH 651

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CITY OF WHITE ROCK  
DEVELOPMENT SERVICES

# Layout Summary - Inspection Sheet

Program spacing override Location unlisted

**Date:** AUG 7, 13 **Designer:** Lovgleen Atwal

**Project Name:** 14423 BLACKBURN CRES **RHWHA #:** 02-222

**City:** WHITE ROCK **Company:** Preet Plumbing & Heating Ltd.

**Address:** 14423 BLACKBURN CRES. **Branch:** 0

**License #:** 1052-02BC **Version:** A 2.0

**Boiler capacity[BTU/h]:** min: 60591 **Boiler temp. [C] / [F]:** 180 [degr F]

**Circulating pump HRF [USG/m]:** 6.06 ft head: 10.66

**Circulating pump baseboard:** 0.00 ft head: 0.00 **Total # of loops:** 18 **manually chosen!!**

**HRF supply water temp.[degr C]** 55.60 [degr F] 132.08 **longest loop [ft]:** 260.91 -

Room:		Floor area	unheated	Zone	pipe size	max centre	min #	pipe length	Heat loss	Heat supply	[ft] of	supp.heat
name	c/w	[sqft]	area [sqft]	#	[inch]	space[inch]	of loops	/ room[ft]	[BTU/h]	[BTU/sqft]HRF	BB	BB [BTU/h]
BDRM#1	0	180.0	0.0	1	1/2	12.0	1	217	3293	18	0	0
CLSOET	BDRM#1	10.0	0.0	1	1/2	12.0	0	0	45	4	0	0
BATH	BDRM#1	40.0	20.0	1	1/2	9.0	0	27	598	30	0	0
BDRM#2	0	240.0	0.0	2	1/2	12.0	2	240	4691	20	0	0
ENSUITE	BDRM#2	72.0	20.0	2	1/2	9.0	0	69	960	18	0	0
BDRM#3	0	195.0	0.0	3	1/2	12.0	2	195	3247	17	0	0
BATH	BDRM#3	72.0	20.0	3	1/2	9.0	0	69	1426	27	0	0
HALLWAY	BDRM#3	48.0	0.0	3	1/2	12.0	0	48	296	6	0	0
M.BDRM	0	300.0	0.0	4	1/2	12.0	3	300	4620	15	0	0
ENSUITE	M.DBDRM	195.0	30.0	4	1/2	9.0	0	220	3246	20	0	0
WIC	M.BDRM	135.0	0.0	4	1/2	12.0	0	135	1270	9	0	0
HALLWAY	M.BDRM	30.0	0.0	4	1/2	12.0	0	30	183	6	0	0
FAMRM	0	306.0	0.0	5	1/2	12.0	4	306	5629	18	0	0
NOOK+KIT	FARM	456.0	40.0	5	1/2	12.0	0	416	4909	12	0	0
S.KIT	FAMRM	120.0	20.0	5	1/2	9.0	0	133	2152	22	0	0
POWRM	FAMRM	60.0	10.0	5	1/2	9.0	0	67	796	16	0	0
DINRM	0	270.0	0.0	6	1/2	12.0	3	270	5080	19	0	0
FOYER	DINRM	168.0	0.0	6	1/2	9.0	0	224	3623	22	0	0
LIVRM	DINRM	289.0	0.0	6	1/2	12.0	0	289	5121	18	0	0
RECRM	0	320.0	0.0	7	1/2	12.0	2	320	4535	14	0	0
LAUNDRY	RECRM	112.0	0.0	7	1/2	12.0	0	112	1087	10	0	0
BDRM	0	156.0	0.0	7	1/2	12.0	1	156	3074	20	0	0
BATH	BDRM	40.0	20.0	7	1/2	6.0	0	40	708	35	0	0
0	0	0.0	0.0	0	1/2	12.0	0	0	0	0	0	0
0	0	0.0	0.0	0	1/2	12.0	0	0	0	0	0	0
0	0	0.0	0.0	0	1/2	12.0	0	0	0	0	0	0
0	0	0.0	0.0	0	1/2	12.0	0	0	0	0	0	0
0	0	0.0	0.0	0	1/2	12.0	0	0	0	0	0	0
0	0	0.0	0.0	0	1/2	12.0	0	0	0	0	0	0
0	0	0.0	0.0	0	1/2	12.0	0	0	0	0	0	0

W/DY TAIL  
TALL

**Note:** Rooms on different zones shall not be combined in the same loop !!

**Note:** Pipe sizes:  1/4"  125 [ft]  3/8"  200 [ft]  1/2"  300 [ft]  5/8"  400 [ft]  3/4"  500 [ft]

Maximum length of continuous tubing shall be: Check if rooms have been manually combined, (look at sheet head at "Total # of loops")

The centre space row shows maximum centre spaces, closer spacing is acceptable.

Heat Supply: [BTU/h] HRF: 60591 BB: 0 Total: 60591 Design temp.drop [degrF] 20

Supplementary heat requiring less than 2' of baseboard heater per room is being ignored.

**Selected RHWHA drawing #:** 41 **Hydronic System Design**

Mixing control: 0 **Contractor:** DELTA PLUMBING

**Signature:** Lovgleen Atwal **#02-222**

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AUG 12 2013

**CITY OF WHITE ROCK  
DEVELOPMENT SERVICES**



# THE CORPORATION OF THE CITY OF WHITE ROCK

15322 Buena Vista Avenue, White Rock, B.C. V4B 1Y6

Telephone: (604) 541-2136 Fax: (604) 541-2153

Permit Number: **6524**

Date: AUGUST 12/13

## APPLICATION FOR PLUMBING/SPRINKLER PERMIT

Location of Work: 14423 BLACKBURN CR. Occupancy: \_\_\_\_\_ Type of Work: New  Existing  Additional

Owner: \_\_\_\_\_ Phone: \_\_\_\_\_ T.Q. Number: 00-193-PL-12.

Contractor: DELTA PLUMBING & HEATING Phone: 604 730 2862. Business Licence: Yes: \_\_\_\_\_ No: \_\_\_\_\_ Applied For:

Floor	Water Heater	Urinals	Water Closets	Wash Basins	Bath Tubs	Showers	Kitchen Sink	Bar Sink	Dish Washer	Wash Tubs	Automatic Washer	Floor Drains	Hose Bibs	Sump	Double Check Valve	Sprinklers	Other Fixtures
Basement	1		1	1	1			1		1	1	1		1			
Main			1	1			2		1								
Second			4	5	3	2											
Third																	
Fourth																	
Fifth																	
Sixth																	
<b>TOTAL</b>	<b>1</b>		<b>6</b>	<b>7</b>	<b>4</b>	<b>2</b>	<b>2</b>	<b>1</b>	<b>1</b>	<b>1</b>	<b>1</b>	<b>1</b>		<b>1</b>			
Fixture Units																	

Water Service Size: \_\_\_\_\_ Total Fixture Units: \_\_\_\_\_ Total No. of Fixtures: 28 PERMIT FEE: \$ 590<sup>00</sup>/100

Signature (Applicant): Dsidha

Signature (Building Official): Barbara Andrews  
Clerk

And I agree to conform to all requirements of the "City of White Rock Building By Law"

COMMENTS: \_\_\_\_\_

MS PLUMPER

590.00

CK

590.00

R:157682 / R:2013081201 / D:3226

12/

Aug/2013 LORI





THE CORPORATION OF THE CITY OF WHITE ROCK

PLANNING AND DEVELOPMENT SERVICES

15322 Buena Vista Avenue, White Rock, B.C. V4B 1Y6

City Hall,  
White Rock, B.C.  
Tel: 604-541-2136  
Fax: 604-541-2153

# Inspection Report

NAME: Redacted S. 22

PERMIT No.: 13-036

ADDRESS: 14423 Blackburn

SHEET No: \_\_\_\_\_

TYPE OF INSPECTION: Drainage

DATE: July 26/13

AREA OF INSPECTION: \_\_\_\_\_

Rainleaders  
Sani outfall

✓ 1) Rainleaders to be properly bedded + sloped  
Add foundation straps at 3 ft intervals

✓ 2) large rocks to be removed from up against  
foundation wall

✓ 3) Sani outfall to be tested

Recall

SIGNATURE: \_\_\_\_\_

INSPECTOR: 

DATE: \_\_\_\_\_

Please sign this form when the work is completed and return to the above department.

# FKL Engineering Consultants Ltd.

3571 Worthington Dr., Vancouver, BC, V5M 3Y1  
 (cell) 604-618-0438, (fax) 604-435-3181

24 July, 2013

Client : Alex Song, 778-859-5015  
 alexsong1212@gmail.com

C.C.  
 The Plumbing Inspector  
 City of White Rock

To: The Builder of the following address:

**Re: 14423 Blackburn Cres., White Rock**  
 (House Foundation Ground Water  
 - Sump & Pump Specifications)

### Site Conditions

Estimated max. total dynamic head - 12 ft  
 Estimated ground water incoming flow - 6 usgpm  
 (based on 40% of 6000 sq.ft lot, one day max. rainfall 5")

Anticipated ground water seepage rate - normal

### One Sump:

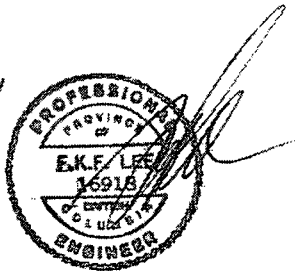
36" dia. Sump, minimum depth between the  
 4" PVC inlet to the sump bottom - 30"

### One Pump or Duplex System (recommended):

4/10 HP sewage /effluent pumps by Myers  
 Pump, model SRM4 or approved equal,  
 115V c/w mechanical flow switch,  
 cast iron housing & volute case, 2" solid handling,  
 rated capacity 45 usgpm @ 12 ft TDH

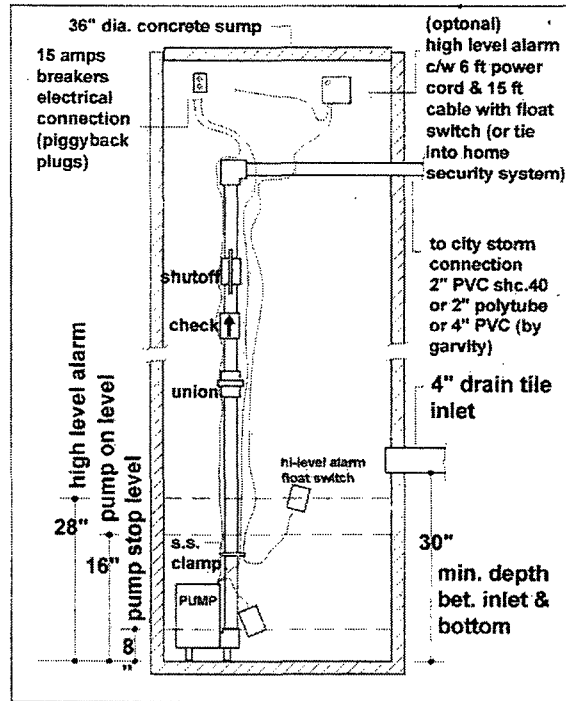
(At normal ground water flow)  
 Estimated pumping cycles - 5 cycles per hour  
 Estimated pumps running time - 2 minutes

Yours truly

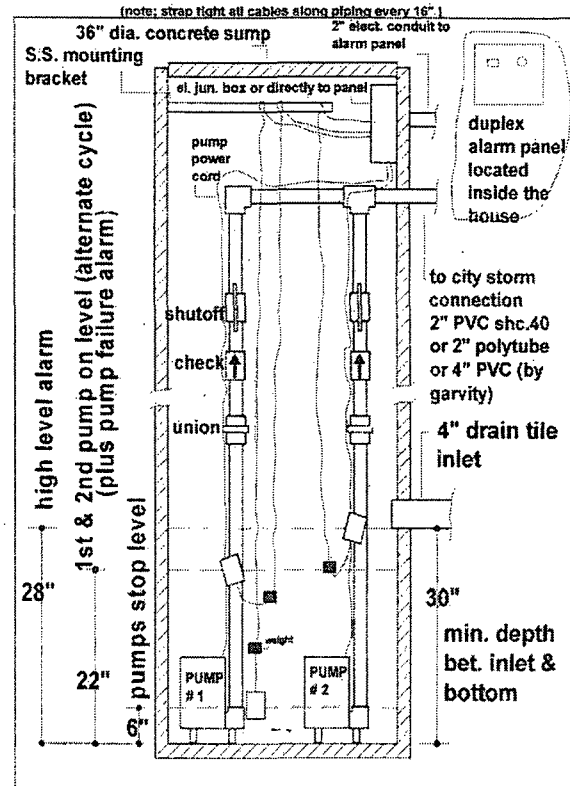


Fred Lee, P. Eng.

Duplex Panel & Pumps Supplier  
 Engineered Pump Systems Ltd.  
 1635 Industrial Ave., PoCo  
 Tel(604) 552-7900, Fax (604) 552-7901



### REQUIRED INSTALLATION



### RECOMMENDED INSTALLATION

(note: strap tight all cables along piping every 16")



THE CORPORATION OF THE CITY OF WHITE ROCK

PLANNING AND DEVELOPMENT SERVICES

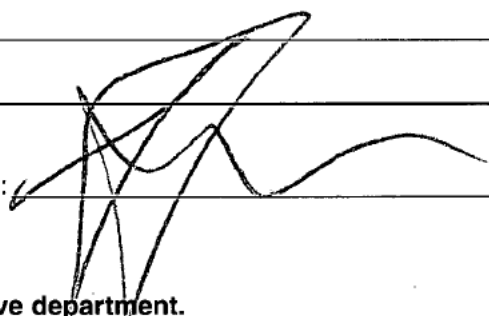
15322 Buena Vista Avenue, White Rock, B.C. V4B 1Y6

City Hall,  
White Rock, B.C.  
Tel: 604-541-2136  
Fax: 604-541-2153

# Inspection Report

NAME: Redacted S. 22 PERMIT No.: 13.036  
ADDRESS: 14423 Blalchurn Cres SHEET No.:  
TYPE OF INSPECTION: Drainage (Partial) DATE: July 23/13  
AREA OF INSPECTION:

1" Domestic water service
1 1/2" Fire sprinkler service
Drain tile
Storm sump
Damp proofing c/w paperwork
Recall for Rain leaders
Storm connection
Soil outfall test
✓ Engineer's stamp storm sump pump drawing required.

SIGNATURE: \_\_\_\_\_ INSPECTOR:   
DATE: \_\_\_\_\_

Please sign this form when the work is completed and return to the above department.

# J & H DAMPPROOFING LTD.

## Responsible Waterproofing

### MANUFACTURERS RESIDENTIAL WARRANTY CERTIFICATE FOR DELTA® - MS.

(SEVEN YEAR INSTALLATION - FIFTY YEAR PRODUCT)

Certificate #

Address: 14423-Blackburn CK  
Date of Installation: July 19-2013

The Manufacturer, COSELLA DÖRKEN PRODUCTS INC.

Warrants that J & H Dampproofing Ltd. is Certified as an Approved Applicator in Western Canada and further warrants that all requirements for installation according to the manufacturers specification have been met as per the installation details of the dampproofing/drainage membrane DELTA®- MS in accordance with the CCMC Evaluation Reports #12658-R. & 12788-R.

This warranty protects the applicator in lieu of the limitations from the warranty. Wherever the DELTA®- MS is installed, a leakage warranty is enforceable.

**TIME PERIOD: SEVEN YEARS** (Transferable, Date of Installation)

Product warranty: 50 years (Transferable, Date of Installation)

In the event that you experience water penetration please call (604) 507-2916 and we will return your call within 24 hours.

**The warranty is as follows:**

- ✓ The DELTA®- MS basement wrap water control system is to be free from defects in material and workmanship. Where the system has been installed, no water shall pass through the basement walls.
- ✓ This warranty shall be in effect for the period of SEVEN (7) YEARS from the date of Installation, and is fully transferable to future owners.
- ✓ DELTA®- MS shall not rust, nor corrode and is warranted for a period of fifty (50) years.
- ✓ The warranty contained herein shall not apply to condensation, any part of the system which has been repaired by a party other than the Certified Contractor, or has been altered in any way, or which has been subjected to misuse, negligence or accident.
- ✓ Contractor liability under this warranty shall be limited to the replacement of any defective work, material, drywall, insulation, and paint. Contractors shall be liable for no other damages or losses. Depending on the nature of the leakage, the applicator shall have the option of repairing from either the interior or exterior of the structure. Maximum liability shall not exceed \$3.00 per square foot of wall area covered by the DELTA®- MS or \$10,000, whichever is lower.
- ✓ Product must be used in locations where the foundation base is well drained in accordance with NBC 1995, Section 9.14.
- ✓ This warranty is made in lieu of all other warranties expressed or implied and of all other obligations of liabilities on the contractor part.

**This warranty does not cover:**

- ✓ The membrane damaged by natural disasters, including but not limited to lightning, gales, floods, hurricanes, tornadoes, earthquakes, or circumstances deemed to be acts of God.
- ✓ The membrane damaged by other trades on the site or by other materials during backfill.
- ✓ Where it is found that the drainage pipe at the footing has been clogged and/or extreme unforeseen hydrostatic (high water table) pressure has occurred. The repair costs are to be born entirely by the builder/contractor.
- ✓ Where the membrane was not installed at the area on the wall where leakage occurred.
- ✓ Installation by a contractor who is not a certified applicator and/or not in accordance with manufacturer current instructions.

Signed: [Signature]; in the City of White Rock

This 19 day of July - 2013



THE CORPORATION OF THE CITY OF WHITE ROCK

PLANNING AND DEVELOPMENT SERVICES

15322 Buena Vista Avenue, White Rock, B.C. V4B 1Y6

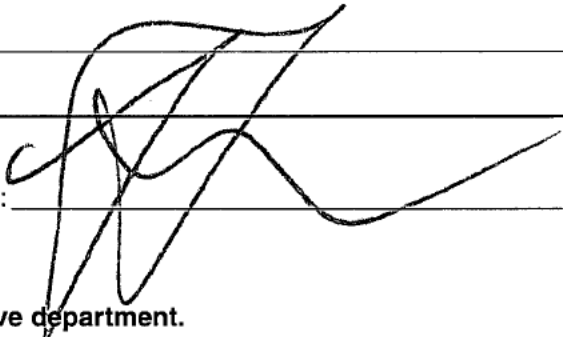
City Hall,  
White Rock, B.C.  
Tel: 604-541-2136  
Fax: 604-541-2153

# Inspection Report

NAME: Redacted S. 22 PERMIT No.: 13.036  
 ADDRESS: 14423 Blackburn SHEET No.: \_\_\_\_\_  
 TYPE OF INSPECTION: Forms DATE: July 15/13  
 AREA OF INSPECTION: Foundation

Survey & Engineers report received.

Approved to pour

SIGNATURE: \_\_\_\_\_ INSPECTOR:   
 DATE: \_\_\_\_\_

Please sign this form when the work is completed and return to the above department.

# OPTIMUM ENGINEERING CORP.

12968-66 AVENUE, SURREY, BC V3W 7H3

Tel: (604) 700-8153 Fax: (604) 543-4035

Date: July 11, 2013

OEC Project#: RACC0G

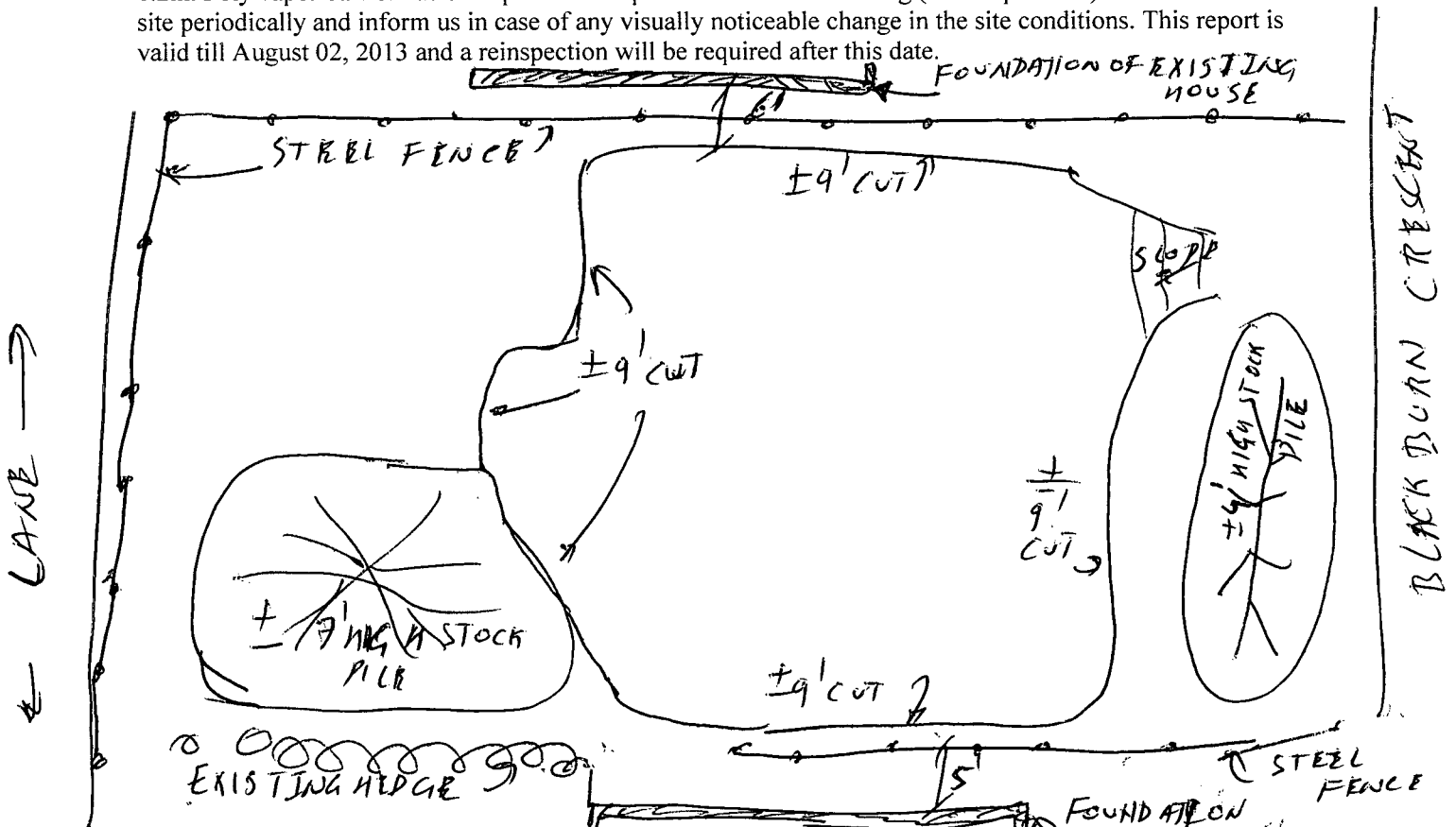
The City of Surrey,  
14245 - 56th Avenue,  
Surrey, BC.  
V3X 3A2

Attention: - Building Inspector.

**Re: Temporary Excavation for site address at: 14423-Blackburn Crescent White Rock, BC.**

Dear Sir/Madam,

We have reviewed the temporary excavated cut to provide formwork at above-mentioned site, and found to be as per the following sketch. All cuts are safe under normal weather conditions. Machinery such as excavators and trucks shall be kept minimum 2.4m away from the top edge of cuts having height more than 1.2m. Poly vapor barrier has been provided as per sketch. Mr. Alex Song (Site Supervisor) will monitor the site periodically and inform us in case of any visually noticeable change in the site conditions. This report is valid till August 02, 2013 and a reinspection will be required after this date.



Please contact the undersigned at 604-700-8153 in case of any further question.

Yours truly,  
Optimum Engineering Corp.



JUL 11 2013

# OPTIMUM ENGINEERING CORP.

12968-66 AVENUE, SURREY, BC V3W 7H3

Tel: (604) 700-8153 Fax: (604) 543-4035

---

Date: July 11, 2013

File: RACC0G

The City of White Rock,  
15322 Buena Vista Avenue,  
White Rock,  
BC. V4B 1Y6

**Attention: Building Inspector**

Dear Sir/Madam:

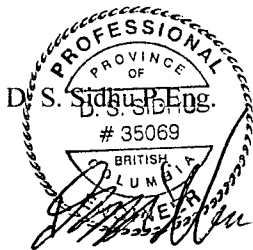
**Re: Foundation Formwork for site address at: 14423-Blackburn Crescent White Rock, BC.**

We have visited the site and reviewed the foundation formwork for single family dwelling at above mentioned site and noted as under:

- Top soil has been stripped off from footing areas and allowable bearing pressure found to be 1500psf.
- Sizes of footings and foundation walls are satisfactory.
- Reinforcement provided is adequate and as per site instructions.
- The formwork is ready for pouring concrete.

Please contact the undersigned at 604-700-8153 in case of any further question.

Yours Truly,  
Optimum Engineering Corp.



JUL 11 2013

**B.C. LAND SURVEYORS CERTIFICATE OF LOCATION  
SHOWING CONSTRUCTED FORMS ON LOT 18  
SECTION 10 TOWNSHIP 1  
NWD PLAN 13899**

**CIVIC ADDRESS :**  
14423 - BLACKBURN CRESCENT  
WHITE ROCK, B.C.

PID : 009-864-512

0 5 10 15 20

SCALE 1 : 250 DISTANCES ARE IN METRES

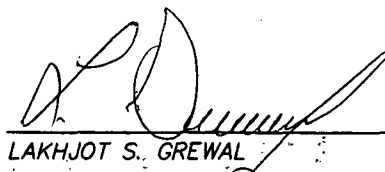
**NOTE:**

⊙⊙.⊙⊙ - DENOTES POUR STRIP ELEVATION (TYPICAL)  
ELEVATIONS ARE GEODETIC (2005)  
DERIVED FROM CITY OF WHITE ROCK  
CONTROL MONUMENT No. 88H3910  
ELEV.=79.622m  
DATUM NAD83 (CSRC) 2005

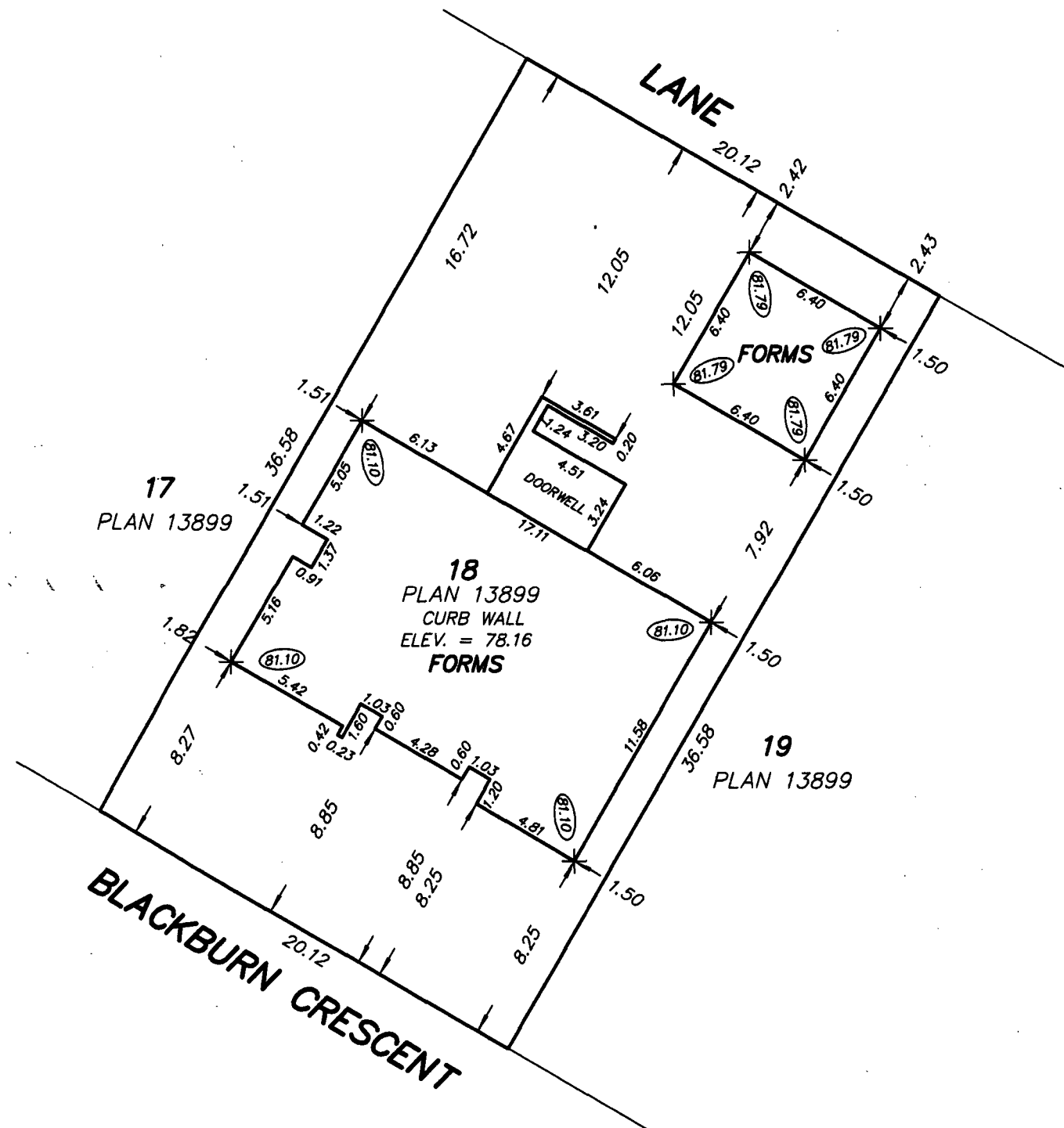
Lot dimensions and clearances according to Field Survey.

This plan was prepared for inspection purposes and is for the exclusive use of our client. The signatory accepts no responsibility or liability for any damages that may be suffered by a third party as a result of any decisions made or actions taken based on this document. This document shows the relative location of the surveyed structures and features with respect to the boundaries of the parcel described above. This document shall not be used to define property lines or property corners. All rights reserved. No person may copy, reproduce, transmit or alter this document in whole or in part without the consent of the signatory.

THIS BUILDING LOCATION CERTIFICATE HAS BEEN PREPARED IN ACCORDANCE WITH THE MANUAL OF STANDARD PRACTICE AND IS CERTIFIED CORRECT THIS 12th DAY OF JULY, 2013.

  
LAKHJOT S. GREWAL B.C.L.S.

This document is not valid unless originally signed and sealed.  
NOT SUITABLE FOR MORTGAGE PURPOSES



**GREWAL & ASSOCIATES**  
PROFESSIONAL LAND SURVEYORS  
UNIT 204, 15299-68th AVENUE  
SURREY, B.C. V3S 2C1  
TEL: 604-597-8567  
EMAIL: Office@GrewalSurveys.com  
FILE : 1301-006  
DWG : 1301-006 CE2





THE CORPORATION OF THE  
CITY OF WHITE ROCK

15322 BUENA VISTA AVENUE, WHITE ROCK, B.C. V4B 1Y6

DEVELOPMENT SERVICES DEPARTMENT TEL: (604)541-2136 FAX: (604)541-2153

**BUILDING PERMIT INFORMATION SHEET**

Civic Address: 14423 Blackburn Cres. Zoning: RS-1

Legal Description: Lot 18 Sec 10 Township 1 NWD Plan 13899 PID: 009-864-512

Site Statistics:

Lot Area: 7920 Square Feet

Lot Coverage: Permitted: 3564 Proposed: 2765  
(Building footprint Including Percentage: 45 % Percentage 35 %  
Any detached Structure)

Setbacks: Permitted: North 24.61' South 24.61' East 4.92' West 4.92'  
Proposed: North 55' South 24.61' East 4.92' West 4.92'

Building Statistics:

Basement Floor 961 Square Feet  
Main Floor 2038 Square Feet (2095 incl. covered areas)  
Upper Floor 1919 Square Feet (- stairs 95sf) = 1824sf  
Registered suite \_\_\_\_\_ Square Feet  
Garage 441 Square Feet  
Other/Additions \_\_\_\_\_ Square Feet  
*ret*

Residential Gross Floor Area: Permitted: 3960 Proposed: ~~3957~~ 3,862  
Percentage: 50 % Percentage 50 49% % *Maxed out.*

Driveway Slope: Permitted: 15% Proposed: 4.2 %

Owner Builder Declaration & Disclosure Notice Yes  No

Third Party Home Warranty Provider: Yes  No

- Name of Provider: \_\_\_\_\_

Builder's Business License Number: \_\_\_\_\_

Board of Variance granted: Yes  No

Spatial Calculation included: Yes  No

Property Adjacent to Water Course or Ravine: Yes  No

Property falls within the Tree Management By-Law: Yes  No

I, Xi Chen (CDS Chen Design Studio Ltd) certify this information to be correct.

Signature: [Signature] Date: 28 Feb 2013

### FEE SUMMARY

Date: JUN 06 2013	Site Address:	File / Permit #: # 13036
Applicant: Alex Song	Phone: 778-859-5015	Receipt #:
Address:		Clerks's Initial:
Person/Company Who Paid the Bond:		

GL CODE	iCity Code	CATEGORY	APPLICATION FEE	ADDITIONAL REFERENCE
<b>Building Permits</b>				
02-1-050-058	BLDGPER	Building Application Fee	\$	
02-1-050-058	BLDGPER	Demolition Permit	\$	
02-1-050-058	BLDGPER	Plumbing/Sprinkler Permit	\$	
02-1-050-058	BLDGPER	Tree Permit Application Fee	\$	
02-1-050-067	RESTRICT	Restrictive Covenant	\$	
02-1-050-068	SECSUITE	Sec. Suite Reg. Fee	\$	
02-1-050-069	B&BREGIS	B & B Registration Fee	\$	
02-1-050-058	SIGNPER	Sign Permit	\$	
02-1-013-028	COPIES	Miscellaneous Copies (Property File/Fiche)	\$	
<b>Bonds/Security Deposit</b>				
02-4-250-876	BONDLAN	Landscaping Bond	\$	
02-4-250-881	BONDTREE	Tree Protection Bond	\$	
02-4-250-881	BONDTREE	Tree Replacement Bond	\$	
02-4-255-889	TREEFEE	Tree Replacement Fee	\$	
02-4-250-875	BONDRD	Road & Right of Way Bond	\$	
02-1-115-067	RDRWINSP	Road & Right of Way Permit	\$ 100-	✓
04-1-112-065	SANITCAP	Sanitary Sewer Cap Fee	\$	
04-1-112-065	SANITCF	Sanitary Sewer Connection Fee	\$	
06-1-118-065	STORMCA	Storm Sewer Cap Fee	\$	
06-1-118-065	STORMCF	Storm Sewer Connection Fee	\$	
02-4-250-878	BONDSID	Sidewalk Café Bond	\$	
02-4-250-877	BONDOCC	Occupancy Bond	\$	
02-4-250-880	BONDMIS	Miscellaneous Bond	\$	
		Misc. Account (need to enter approp. GL #)	\$	
<b>Total</b>			100- \$0.00	

VISA  
 R:156141 / R:2013061302 / D:3185  
 Jun/2013 LORI  
 100.00  
 100.00

MS BONDRD

100.00

Prepared by:

15322 BUENA VISTA AVE  
WHITE ROCK, BC V4B 1Y6  
Telephone : (604) 541-2139  
Fax No. : (604) 541-2153



"City of White Rock Licence Bylaw No. 1510"  
**BUSINESS LICENCE**

LOCATION OF BUSINESS :

LICENCE EFFECTIVE :

FROM : 01-May-2013  
TO : 30-Apr-2014

NAME AND ADDRESS OF BUSINESS :

LICENCE NO. : **21469**

**RUILIDA CONSTRUCTION LTD**  
10931 RYAN RD  
RICHMOND, BC V7A 2G5

CUSTOMER : **RUILID01**

Licence Fee :	<b>175.00</b>
---------------	---------------

BUSINESS DESCRIPTION :

**BUILDING CONTRACTOR**

THIS IS TO CERTIFY THAT THE LICENSEE IS ENTITLED TO CARRY ON SUCH  
BUSINESS AS INDICATED WITHIN THE CITY OF WHITE ROCK IN A LAWFUL  
MANNER AND IS ISSUED SUBJECT TO THE PROVISIONS OF ALL BYLAWS IN  
EFFECT IN THE CITY OF WHITE ROCK

**THIS LICENCE MUST BE POSTED IN A CONSPICUOUS PLACE ON THE PREMISES**

**CASH REGISTER IMPRESSION CONSTITUTES OFFICIAL LICENCE**



**Wawanesa**  
**Insurance**

supersedes any previous declaration bearing  
the same number for this policy period.

NAME AND ADDRESS OF INSURED:  
0828 1101547  
RUILIDA CONSTRUCTION LTD  
C/O  
10931 RYAN RD  
RICHMOND BC V7A 2G5

12:01 A.M. STANDARD TIME AT THE ADDRESS OF THE  
NAMED INSURED AS STATED HEREIN  
POLICY PERIOD:  
FROM TO  
JUL 13,12 JUL 13,13

POLICY NUMBER:  
M 1101547 VANCOUVER

WORLD INSURANCE SERVICES LTD  
SUITE #2, 7100 RIVER ROAD  
RICHMOND, BC V6X 1X5  
TEL. (604) 606-3388 0108282  
FAX (604) 606-3399

COMMERCIAL LIABILITY COVERAGE SECTION

AMOUNTS OF INSURANCE

GENERAL AGGREGATE .....	\$ 5,000,000	✓	---
PRODUCTS - COMPLETED OPERATIONS AGGREGATE ...	\$ 2,000,000		---
EACH OCCURRENCE .....	\$ 2,000,000		
PERSONAL AND ADVERTISING INJURY .....	\$ 2,000,000		
TENANTS' LEGAL LIABILITY - ANY ONE PREMISES .	\$ 100,000		
MEDICAL PAYMENTS - ANY ONE PERSON .....	\$ 5,000		
NON-OWNED AUTOMOBILE .....	\$ 2,000,000		

DEDUCTIBLE: PROPERTY DAMAGE LIABILITY \$ PER CLAIM  
\$ 1,000 PER OCCURRENCE

LOCATION OF ALL PREMISES YOU OWN, RENT OR OCCUPY

LIABILITY CLASSIFICATION	CODE NO	PREMIUM BASIS	RATE	ADVANCE PREMIUM
RESIDENTIAL GENERAL CONTRACTOR	1811-01	RECEIPTS: \$4,000,000	VRS	\$2,800
NON-OWNED AUTO HIRED AUTO		EXCLUDED		INCL
EXCLUSIONS: TOTAL POLLUTION EXPLOSION & COLLAPSE				

TOTAL PREMIUM \$ 2,800

FORMS/ENDORSEMENTS APPLICABLE  
CL9300 CL9347 CL9352 CL9373 CL9345  
CL9315



WORKING TO MAKE A DIFFERENCE

**Assessment Department**

**Mailing Address**

PO Box 5350  
Station Terminal  
Vancouver BC V6B 5L5

**Location**

6951 Westminster Hwy  
Richmond BC  
V7C 1C6  
www.worksafebc.com

**Clearance Section**

Telephone 604 244 6380  
Toll Free within Canada  
1 888 922 2768  
Fax 604 244 6390

RUILIDA CONSTRUCTION LTD  
10931 RYAN RD  
RICHMOND BC V7A 2G5

June 14, 2013

**Person/Business: RUILIDA CONSTRUCTION LTD  
911316 - AA (011)**

We confirm that the above-mentioned account **recently registered**, effective **May 20, 2010**, and its first assessment remittance to the Workers' Compensation Board is not yet due.

Contractor liability is outlined in Section 51 of the *Workers Compensation Act*.

Employer Service Centre  
Assessment Department

**Clearance Reference #: 441546**  
CLRA5-7

1487060

**Now you can get clearance letters, report payroll and pay premiums online.  
Go to [www.worksafebc.com](http://www.worksafebc.com)**

*Please refer to your account number in your correspondence or when contacting the Assessment Department.*

To alter this document constitutes fraud.



Homeowner  
Protection Office  
Branch of BC Housing

# New Home Registration Form

The purpose of this form is to certify, for the purpose of section 30 of the Homeowner Protection Act, that a proposed new home is covered by home warranty insurance and built by a licensed residential builder.

Form: 264655

## A. BUILDER INFORMATION

Licence Number: 33299

Expiry Date: July 31, 2013

Company Name: Ruilida Construction Ltd.

## B. PROPERTY INFORMATION

Civic Address: 14423 Blackburn Crescent

City/Town: White Rock

Province: British Columbia

Postal Code: V4B 3A3

PID: 009-864-512

Legal Description: PL 13899 LT 18 LD 36 SEC 10 TWP 1

Owner(s) of the Property: **Redacted S. 22**

## C. CONSTRUCTION INFORMATION

Number of Dwelling Units: 1

Type of New Home: Single

## D. PROOF OF HOME WARRANTY INSURANCE

Certified and sealed by warranty provider:

Seal:

Warranty Provider: Aviva Insurance Company of Canada

Builder Warranty No.: nhwb96622

Insurance No.: NHWB96622-A20

Warranty Provider Seal Date: March 28, 2013



## E. BUILDING PERMIT INFORMATION

To be completed by municipality or regional district and returned to the HPO:

Municipality or Regional District:

Corporation of the  
City of White Rock

Permit issued to: *Alex Song*

Date Issued: (month/day/year) JUN 17 2013

Permit No.: 13-036

Correction to civic address, type of new home or other information, if applicable:



# Notice of Construction

Planning & Development Services Department  
15322 Buena Vista Ave., White Rock, B.C. V4B 1Y6  
Phone: 604 541 2136 Fax: 604 541 2153  
Website: [www.whiterockcity.ca](http://www.whiterockcity.ca)

**Adjacent Properties:**

14417 Blackburn Crescent

14433 Blackburn Crescent

A Building Permit will be issued and construction will be commencing soon next to your property  
At 14423 Blackburn Crescent.

Compliance with the current BC Building Code is required as well as all other City of White Rock's Bylaws and other enactments. Included with the information given to the applicant / builder along with the Building Permit and plans are WorkSafe BC requirements, to ensure a safe environment for construction workers as well as other members of the public.

The purpose of this notice is to inform you that the City of White Rock does not authorize any encroachments to neighbouring properties; the contractor and/or owner/builder is responsible not to encroach into or cause damage to neighbouring properties. **Any encroachment or damage to the property is the responsibility of the contractor and/or owner/builder and any disputes resulting from this can only be resolved through civil litigation.**

This notice is presented by the contractor:

Builder Name: Ruilida Construction Ltd. (Alex Song - **Redacted S. 22**)  
Builder's E-mail: [alexsong1212@gmail.com](mailto:alexsong1212@gmail.com)  
Owners: **Redacted S. 22**  
Owner's Address: **Redacted S. 22**  
Phone Number: **Redacted S. 22**  
Owner's E-Mail: unavailable

The neighbouring properties shall be notified by way of this notice prior to the start of construction by:

Contractor or Owner/Builder: Alex SONG

Signature:  Date: JUN 17 2013



CITY OF  
WHITE ROCK

ORIGINAL

**Corporation of the City of White Rock**  
**HIGHWAY AND/OR RIGHT OF WAY USE PERMIT**

Associated with Building Permit No. 13-036

<b>Location of Work: 14423 Blackburn Crescent</b>	
<b>Effective Date: April 5, 2013</b>	<b>Expiry Date: April 5, 2014</b>

<b>Owner:</b>	<b>Prime Contractor:</b>
Name: Redacted S. 22	Name: Alex Song
Address: Redacted S. 22 Redacted S. 22	Address:
Telephone 1:	Telephone 1: 778-859-5015
Telephone 2	Telephone 2

**A. PERMISSION IS HEREBY GRANTED TO: Alex Song**

to do the following work at the above location:

- Construct / improve driveway access from Blackburn Crescent Lane as per comments shown on site plan date stamped received March 28, 2013 and designed by Chen Studio Design Ltd. Driveway and Boulevard restoration must be completed to meet the completion requirements described below prior to the return of the **\$2500.00** Security:
- Driveway access within the City Blvd (road edge to PL) to slope up a minimum 2%.
- Driveway from the property line to the garage slab to have a slope not exceeding 15%.
- Backfill under the driveway within the City Boulevard must be structural fill (3" minus material) compacted to 95% Modified Proctor Density.
- Driveway access width through the City Boulevard (road edge to PL) to be a maximum of 6.0m (min 4.5m).
- Driveway access through the City Blvd. may be asphalt or brick pavers. Concrete is not permitted.
- Walkway access from PL to Blackburn Crescent to be 1.5m in width and constructed of paver type material.
- Cost to remove, repair or replace curb, gutter, sidewalk, and letdown works to be borne by the owner/developer.
- No retaining walls or "landscape rock" are permitted on the City Boulevard.
- Remaining City Boulevard (road edge to property line) must be restored with a minimum 150mm of topsoil and sod.



- Any alterations or improvements on the City Boulevard must first be approved by the Engineering Department.

**B. COMPLETION REQUIREMENTS**

- For inspection please call 604-541-2181
- Note: A charge of \$100.00 shall be paid for each additional inspection made not mentioned above.

**C. CONDITIONS OF PERMIT**

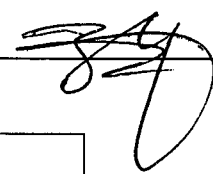
- I hereby agree to abide by all the terms of this permit and the City's Street and Traffic By-law which pertain to this permit.
- I have deposited as security the amount of \$2500.00 with the City to guarantee the fulfillment of the conditions and completion requirements of this permit and of the Work within the time specified for the permit.
- I understand the City will return the security upon successful completion of this Work and if required a submission and acceptance of an as-built drawing (and after all City inspections are passed) minus any costs incurred by the City in respect of inspecting or rectifying the Work.
- I further agree to indemnify and save the City harmless against any and all claims, actions or expenses whatsoever or by whomsoever brought against the City by reason of the City granting me this City Road and Right of Way Use permit or by reason of the construction of the above-referred Work, including any matter that may arise under the Worker's Compensation Act, R.S.B.C. 1996, c. 492 ("the Act") and its regulations.
- This permit is not valid without insurance. The Corporation of the City of White Rock must be named as additional insured on policy for a minimum of \$5,000,000.00 liability. The Prime Contractor must be skilled in the work assigned, and must comply with the Act and its Occupational Health and Safety Regulations. The Prime Contractor must comply with the "BC Manual for Traffic Control for Work on Roadways".
- The Prime Contractor must have a valid City of White Rock business license.
- All works shall be completed in accordance with all current Corporation of the City of White Rock construction specifications and standard drawings. The Prime Contractor shall not employ or sub-contract with any party not skilled in the work assigned. As-built drawing may be required with the attached specifications prior to release of security.

**PRIME CONTRACTOR'S DECLARATION AS PER WORKER'S COMPENSATION ACT**

I/We acknowledge, in accordance with the provisions of the *Worker's Compensation Act*, R.S.B.C. 1996, Chapter 492 that I/we are the "Prime Contractor" and are qualified to act as the "Prime Contractor". I/we accept the duties and responsibilities for the coordination of health and safety in accordance with the *Act*. I/we will do everything that is reasonably practicable to establish and maintain a system or process that will ensure compliance with the *Act* and the Occupational Health and Safety Regulations made thereunder.

Issued By: 

Name of Prime Contractor: Rev. lida Construction Ltd Alex sark

Signature of Authorized Signatory:  Date: JUN 17 2013

FEES AND SECURITY	
Security Amount - Paid at Demo	\$2500.00
Permit Fee	\$100.00
	TOTAL \$100.00
Deposit Receipt No.:	



**Corporation of the City of White Rock - Public Works Department**

**BUILDING PERMIT #13-036**

Address: **14423 Blackburn Crescent** Applicant: **Alex Song**  
 Legal Description: **Lot 18, Plan 13899, Section 10, Township 1, New Westminster Land District**  
 Owner's Name: **Redacted S. 22** Phone #: **Redacted S. 22**

Date Filed: \_\_\_\_\_ Date Paid: \_\_\_\_\_  
 Date Installed: \_\_\_\_\_

**ORIGINAL**

**Sanitary Sewer Service**

\*Depth and Location are approximate and to be used as a guide only

Proposed Location:

**100mm PVC service 1.2m from the lowest property corner or to be determined at time of installation**

Approximate Depth:

**To be determined during installation**

Main Extension Required:

Yes  No

Remarks:

**NOTE: Service Connection Fees are taken as a deposit only and may be subject to additional charges as per the City of White Rock's Sewer Connection Bylaw No. 396 As well as confirmation by the City of White Rock's Public Works Department.**

Cap-Off Fee	(\$100.00 if not collected at time of Demo Permit	\$100.00	
Connection Fee	(\$2,500.00)	\$2,500.00	
Inspection Fee	(\$100.00)	\$100.00	
Total Cost for Sanitary Connection		<b>Paid at Demo</b>	<b>\$2,700.00</b>

**Storm Sewer Service**

\*Depth and Location are approximate and to be used as a guide only

Proposed Location:

**100mm PVC service 1.0m from the lowest property corner or to be determined at time of installation**

Approximate Depth:

**To be determined during installation**

Main Extension Required:

Yes  No

Remarks:

**NOTE: Service Connection Fees are taken as a deposit only and may be subject to additional charges as per the City of White Rock's Sewer Connection Bylaw No. 396 As well as confirmation by the City of White Rock's Public Works Department.**

*If a gravity storm sewer connection cannot be established a restrictive covenant will need to be registered on the title of the property at the Land Title Office, identifying that the lot cannot be drained by gravity and must be serviced by a privately owned pump. The registered owner of the lot will be responsible for maintaining the pump system.*

Cap-Off Fee	(\$100.00 if not collected at time of Demo Permit	\$100.00	
Connection Fee	(\$2,500.00)	\$2,500.00	
Inspection Fee	(\$100.00)	\$100.00	
Total Cost for Storm Connection		<b>Paid at Demo</b>	<b>\$2,700.00</b>

**Total Cost For Storm & Sanitary Services \$5,400.00**

**General Requirements**

- IF THE ABOVE LOCATION OF THE NEW SERVICE IS NOT WHERE THE OWNER / BUILDER WOULD LIKE THEY MUST REQUEST A NEW LOCATION THROUGH PUBLIC WORKS AND AN ADDITIONAL FEE WILL BE REQUIRED
- Owner / Builder must expose existing sanitary service at the property line for Cap-Off by Public Works Foreman. Failure to do so will result in denial for request of a Building Permit.
- All work must conform to the Corporation of the City of White Rock Standards and Specifications
- All inspections on private property to be carried out by the City's Building Department
- The owner / builder is responsible for maintaining and lowering the Inspection Chamber to no lower than finished grade. Any replacement / repairs to the Inspection Chamber must be done by the City and the costs will be charged to the owner.
- All services will be installed at the lowest possible elevation, however, the City is not responsible for providing a gravity service. It is the owner's / builder's responsibility to connect at that elevation at property line whether by gravity or sump pump.
- The owner/builder is responsible to determine the minimum basement elevation of the works proposed, and is also responsible in determining if a restrictive covenant is required. MBE for gravity connections are determined to be 200mm above the existing grade of the road or the 100 year hydraulic grade line as determined by the owner/developer or their consultant.
- Notify Public Works Foreman (541-2181) **two weeks** prior to service installation to allow for scheduling of work

Date: **JUN 17 2013** Applicant's Signature:

## Carolyne Leveille

---

**From:** amarkovic@city.whiterock.bc.ca  
**Sent:** Monday, June 17, 2013 8:55 AM  
**To:** Carolyne Leveille  
**Cc:** Alan Markovic  
**Subject:** Request for action - -14423 BLACKBURN CRES

Hi: Carolyne

Song,Alex at 14423 BLACKBURN CRES called on 2013-04-09

Telephone Number:

Cellphone Number:

Inquiry Type: Demo Permit

Action Requested: History

Comments:

Cap-offs complete. Ok to release BP. AM

Additional Notes:

\*\* Click on the ADDRESS link to bring up the map.

Click here to enter the COMPLETION DATE after the job is done.



THE CORPORATION OF THE  
**CITY OF WHITE ROCK**  
 PLANNING AND DEVELOPMENT SERVICES  
 15322 BUENA VISTA AVENUE, WHITE ROCK, B.C. V4B 1Y6  
 Phone: 604-541-2136 Fax: 604-541-2153

**APPLICATION FOR BUILDING PERMIT**

Date: March 27 2013

I hereby apply under the provisions of "White Rock Building By-Law" and amendments thereto, for permission to build/alter the following: SFD no suite

(Copy of Plans of Proposed Building or Alteration to Accompany this Application)

Zoning: RS-1 Development Permit # \_\_\_\_\_

Legal Description: lot 18 Sec 10 Twp 1 Plan 13899

Project Civic Address: 14423 Blackburn Cr.

Survey Plan required  No  Yes

Are there any buildings already occupying any portion of said land? yes

What are they, and what are they used for? SFD

Entire value, when completed \$ 693,940.

Name and address of owner **Redacted S. 22**

**Redacted S. 22** Phone: **Redacted S. 22**

Email: \_\_\_\_\_


Name and address of builder A2 Builida Const. Ltd - Alex Song

10931 Ryan Rd. Richmond V7A 2G6 Phone: 778 859 5015

Email: Alex.song1212@gmail.com

Builder's Business Lic. #: \_\_\_\_\_

Name of project architect / engineer (if any) \_\_\_\_\_

Roll No. 887.000. Signature of Applicant 

Print Name Alex SONG

Building Permit Fee: \$ 5,950.00

And I agree to conform to all requirements of said By-Law.

Permit No: 13 036 5900.00  
50.00

The approval of the plans and the issuance of a permit shall not in any way relieve the owner of any building or structure from full responsibility for carrying out the work or having the work carried out in accordance with the requirements of all the applicable by-laws of the Corporation of the City of White Rock.

MS BLDGPER 5900.00  
MS COPIES 50.00

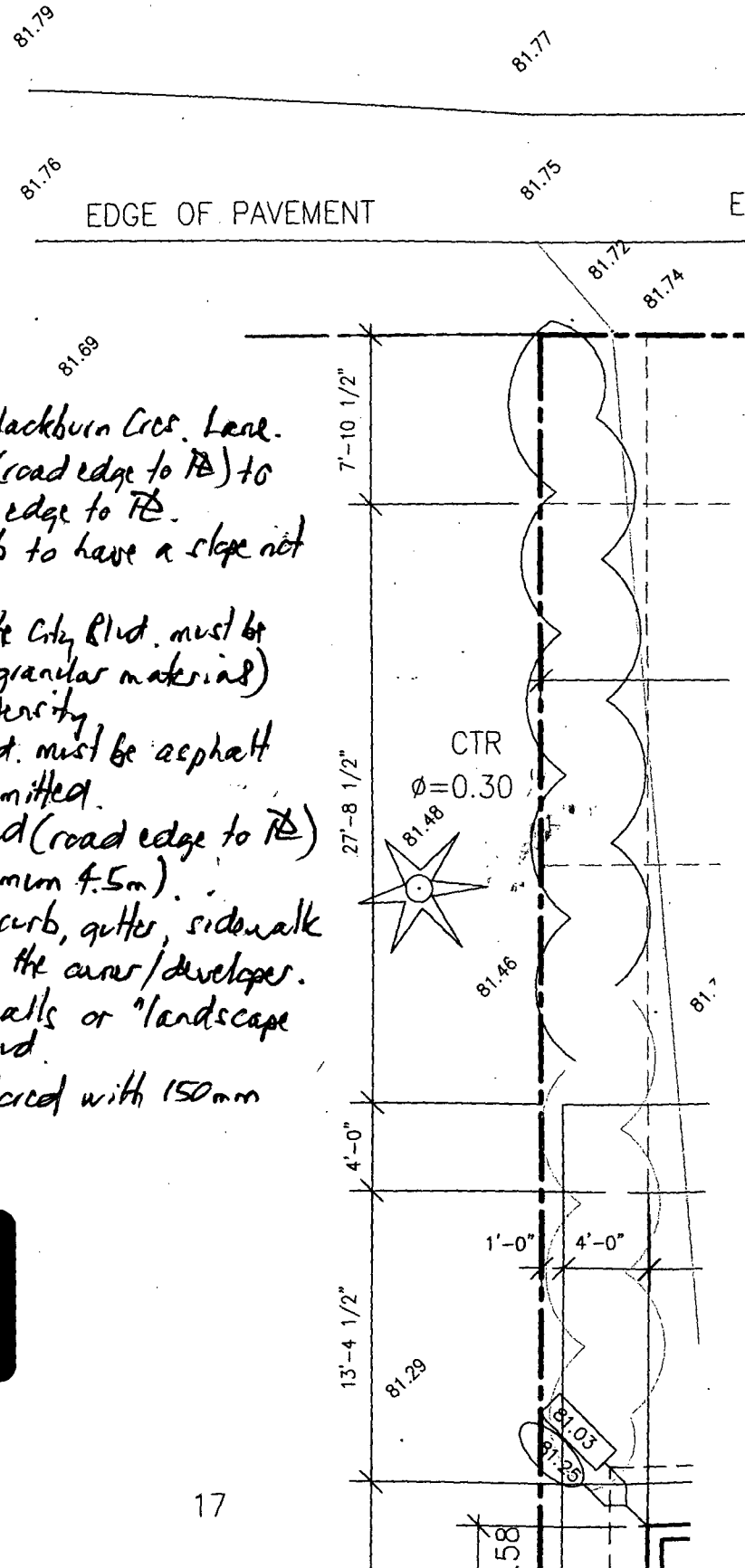
Sub-T

otal : 5950.00  
CK 5950.00  
R:152915 / B:2013032702 / D:3124 27/  
Mar/2013 LORI

Engineering Comments:

- Driveway access approached off of Blackburn Cres. Lane.
- Driveway access within the City Blvd. (road edge to PE) to slope up a minimum 2:1 from the road edge to PE.
- Driveway from the PE to garage slab to have a slope not exceeding 15:1.
- Back fill under the driveway within the City Blvd. must be structural fill (3" minus free draining granular material) compacted to 95% Modified Proctor Density.
- Driveway access through the City Blvd. must be asphalt or brick pavers. Concrete is not permitted.
- Driveway access through the City Blvd. (road edge to PE) cannot exceed 6.0m in width (minimum 4.5m).
- Cost to remove, repair, or replace curb, gutter, sidewalk or letdown works to be borne by the owner/developer.
- No structures such as retaining walls or "landscape rock" is permitted on the City Blvd.
- Remaining City Blvd must be restored with 150mm of top soil and sod.

Any alterations/improvements to the City Boulevard require written approval from the Municipal Operations Department - Engineering Division at 877 Keil Street. 604-541-2181.



**Building Permit ROW Checklist**

Site Address: *14423 Blackburn Cres.*

Applicant/Authorized Agent/Prime Contractor: *Alex Song*

Yes                      No

**1. Storm and Sanitary Connections (as per GIS data):**

Storm Connection: *None existing - City to install*  
 Main Extension Required:  
 Applicant to confirm if pump required-covenant registered

	X
	X
X	

Sanitary Connection: *Not on file - City to upgrade*  
 Main Extension Required:

X	
	X

**2. Storm and Sanitary Cap-offs:**

Storm cap-off completed?  
 Sanitary cap-off completed?

	X
	X

**3. ROW Use Permit:**

Driveway access as per Street and Traffic Bylaw/Policy

X	
---	--

Driveway Relaxation (If granted, is covenant registered)

	NA
--	----

**4. Minor Improvements as per Bylaw/Policy**

*walkway to Blackburn Road edge - 1.5m width - pavers*

X	
---	--

**5. Retaining Walls Over 1.0m in height**

Schedule B – Assurance of Professional Design and Field Review

Form B - Proof of Professional Liability Insurance

Certificate of Liability Insurance

Engineer's Estimate of Works on City Property

Schedule C-B – Assurance of Professional Field Review

	NA
	NA
	NA
	NA
	NA

**Prime Contractor to Provide:**

Certificate of Insurance - \$5 Million Liability Amount  
 Naming the City of White Rock as "Additional Insured"

*- A.S. to collect*

City of White Rock Business Licence

*- A.S. to collect*

WCB Clearance Letter

*- A.S. to collect*



## Carolyn Leveille

---

**From:** Carolyn Leveille  
**Sent:** Thursday, May 16, 2013 3:48 PM  
**To:** Redacted S. 22  
**Subject:** RE: Subject: 14423 Blackburn Cres - Plan review issue

Kindly provide the City with two (2) new full size sets of working dwgs. signed and sealed by structural engineer in order to resume plan review.

Thank you kindly.

Regards,

Carolyn G. Léveill , AT.AIBC  
Plan Checking Clerk  
Planning & Development Services Department  
p: 604-541-2144  
f: 604-541-2153  
e: [cleveille@whiterockcity.ca](mailto:cleveille@whiterockcity.ca)

-----Original Message-----

**From:** Redacted S. 22  
**Sent:** Wednesday, May 15, 2013 10:13 AM  
**To:** Carolyn Leveille  
**Subject:** Subject: 14423 Blackburn Cres - Plan review issue

Good Morning Carolyn:

Please find attached revised drawings (for access to roof deck).  
Would you need more information or anything else, please let me know. Thanks.

Regards,

Redacted S. 22

This drawing shall not be used for construction unless it is countersigned by the CONSULTANT.

Date: Issued For:

A A DETAIL NUMBER  
B LOCATION SHEET  
C DETAIL SHEET

All drawings, specifications and other related documents are the copyright property of the CONSULTANT and shall be returned upon request. Reproduction of drawings and related documents, in whole or in part, is forbidden without the written permission of the CONSULTANT. The contractor shall check and verify all pertinent dimensions and report any discrepancies to the CONSULTANT before proceeding with the work.

Project:  
14423 Blackburn Cres.  
Whiterock, B.C.

14423 Blackburn Cres.  
Whiterock, B.C.

Drawing Title:  
DETAILS

Date:

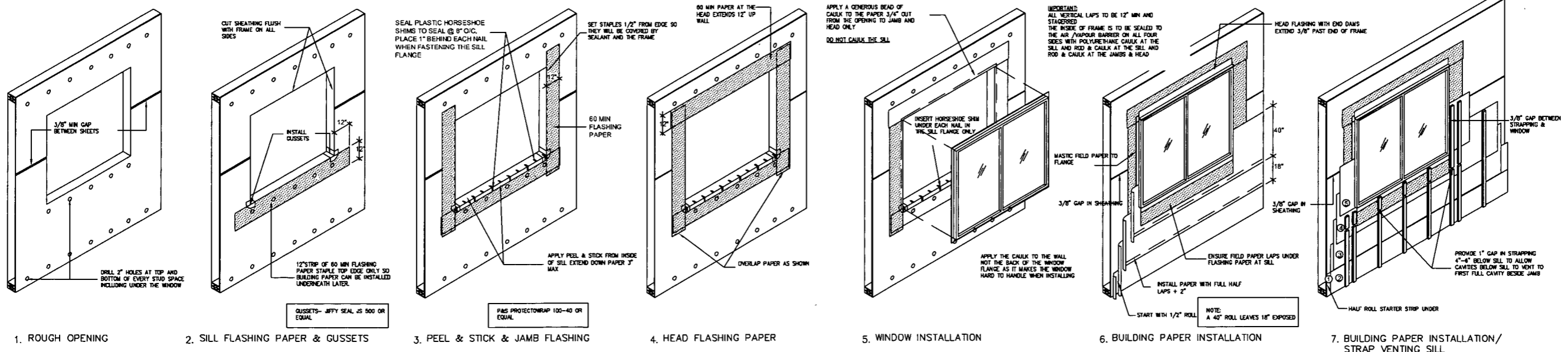
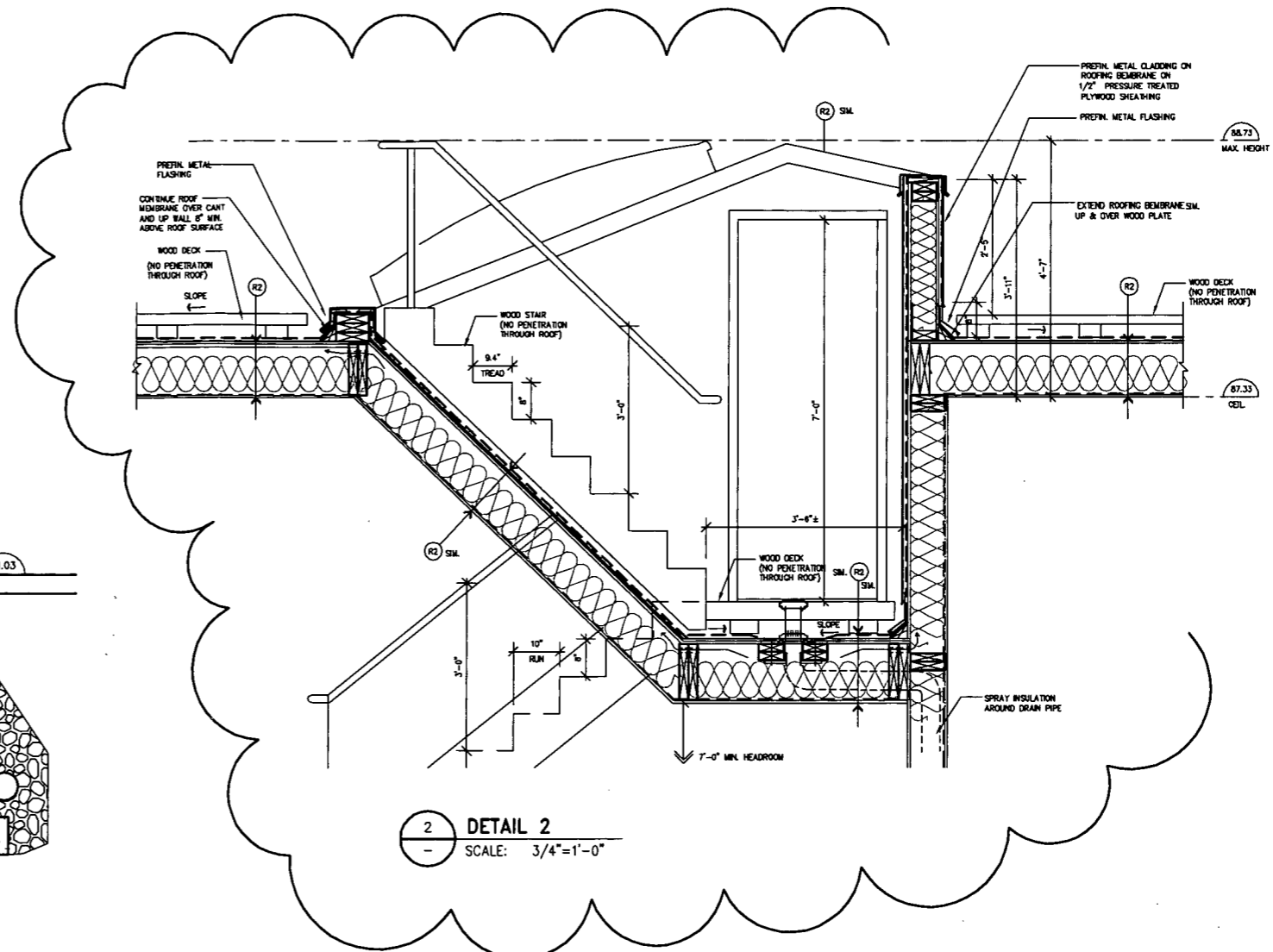
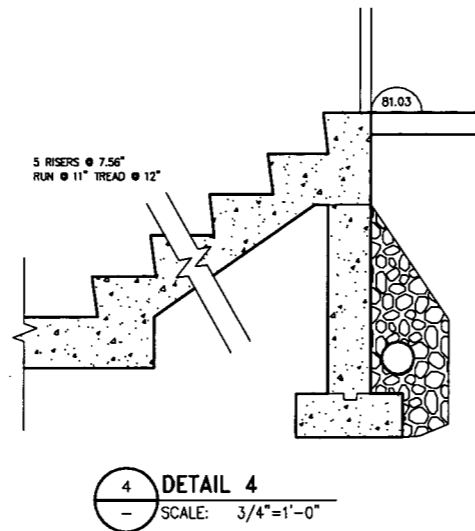
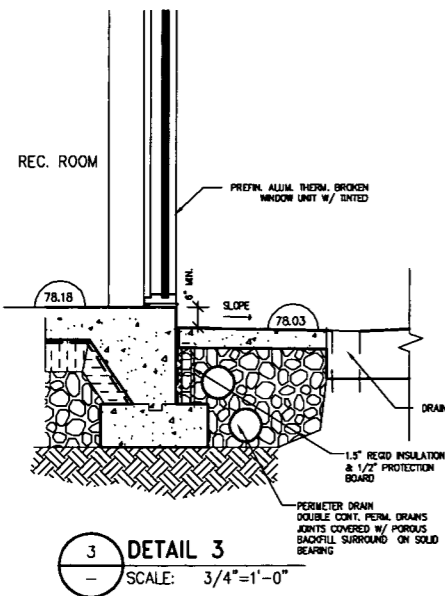
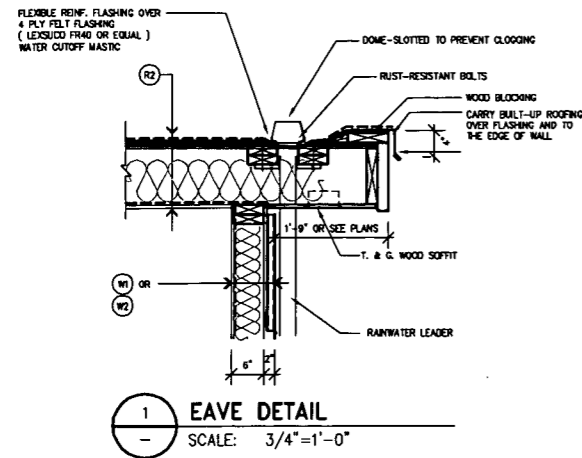
Scale:

Drawn By:

Checked By:

Project No.:

Drawing No.:



CDS

CHEN  
DESIGN  
STUDIO  
LTD.

3226-8700 McKim Way,  
Richmond, BC V7X 4A5  
Tel. (604) 275-8882  
Fax (604) 909-1736

This drawing shall not be used for construction unless it is counter-signed by the CONSULTANT.

Date: Issued For:

A	A DETAIL NUMBER
B	B LOCATION SHEET
C	C DETAIL SHEET

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Project:

14423 Blackburn Cres.  
Whiterock, B.C.

14423 Blackburn Cres.  
Whiterock, B.C.

Drawing Title:  
FLOOR PLANS

Date:

Scale:

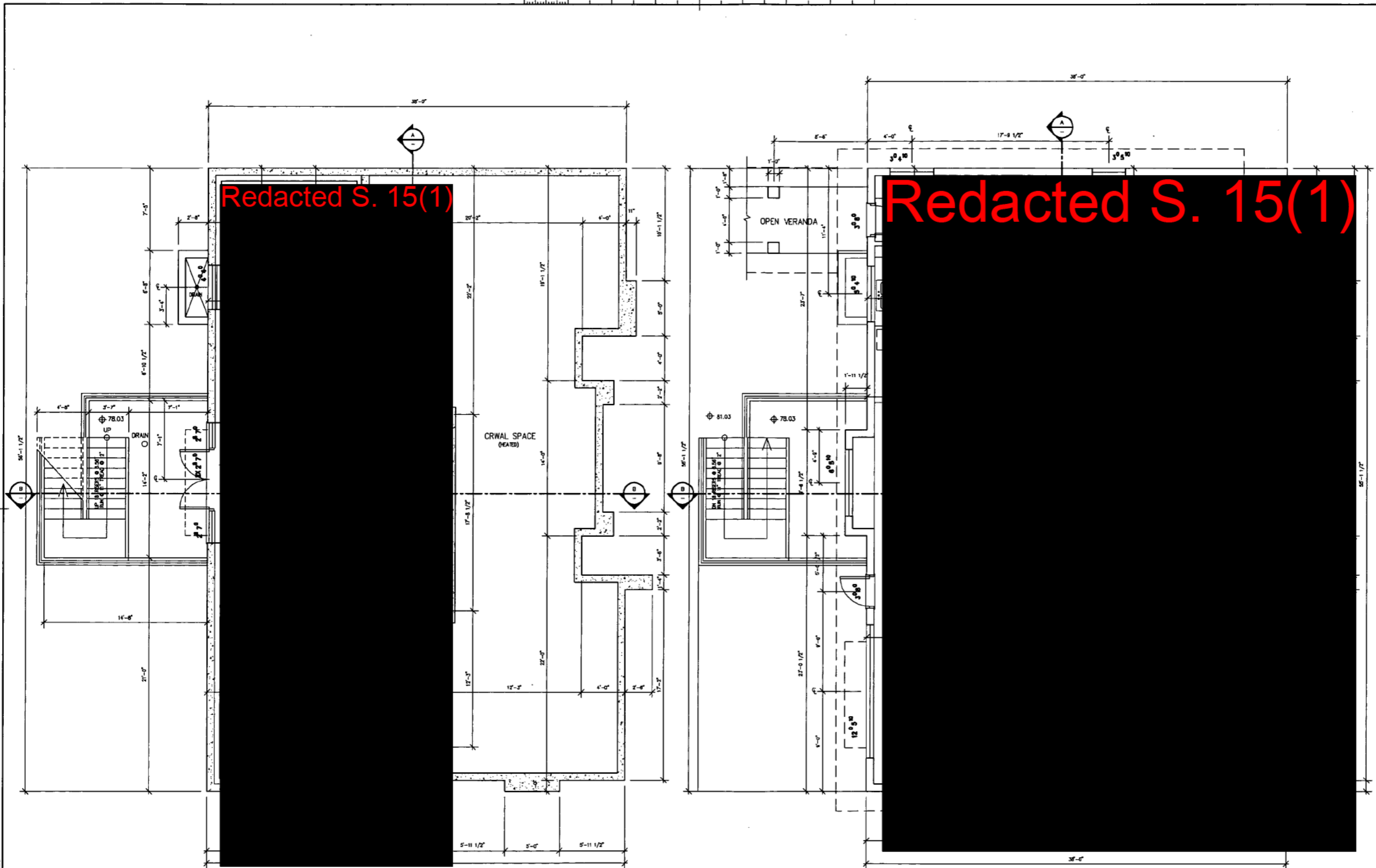
Drawn By:

Checked By:

Project No.:

Drawing No.:

A2



**BASEMENT FLOOR PLAN**

SCALE: 1/8"=1'-0"

961 S.F.

NOTE:  
DIMENSION FOR EXTERIOR WALLS ARE MEASURED  
FROM EXTERIOR WALL FINISH.

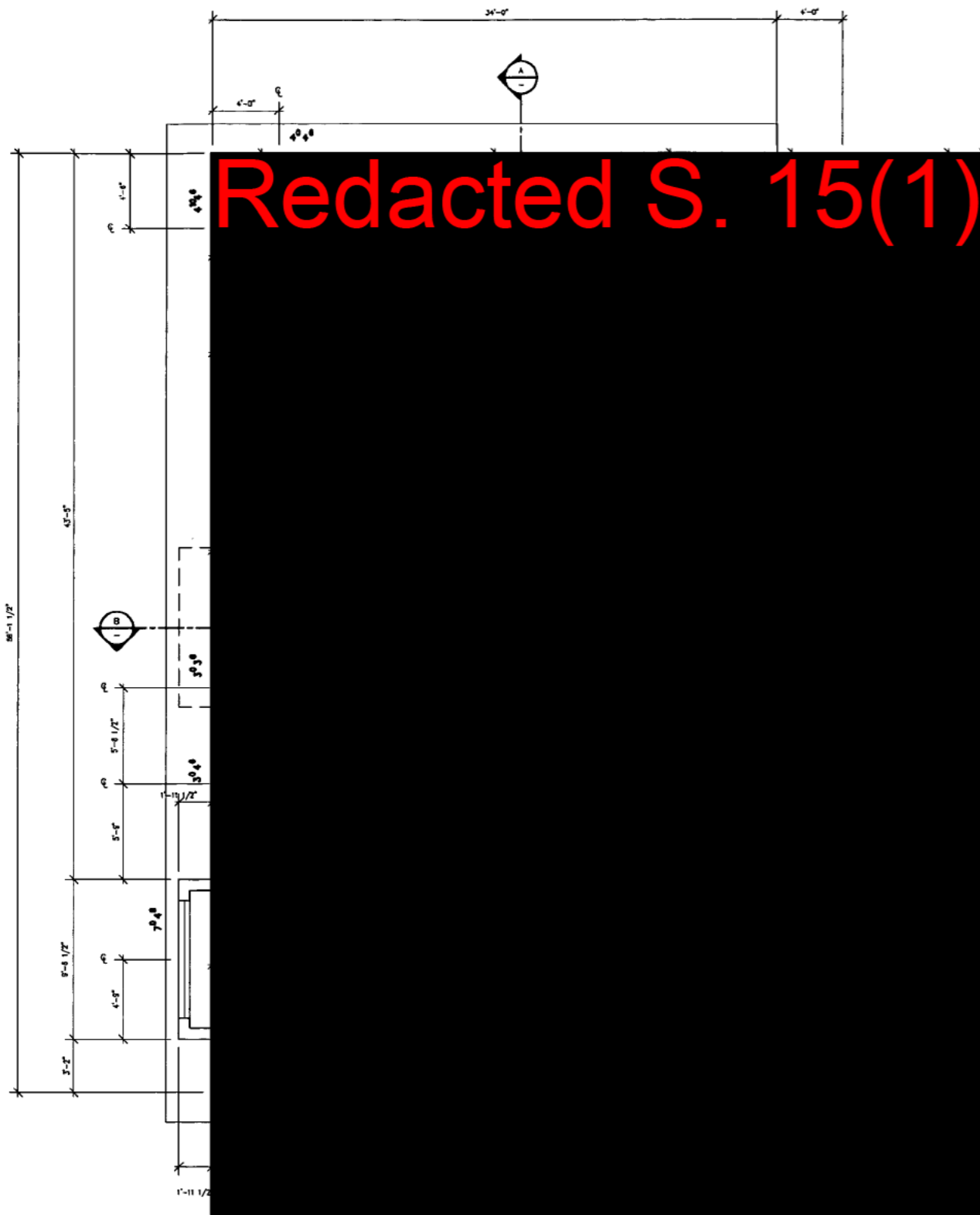
**GROUND FLOOR PLAN**

SCALE: 1/8"=1'-0"

2038 S.F.

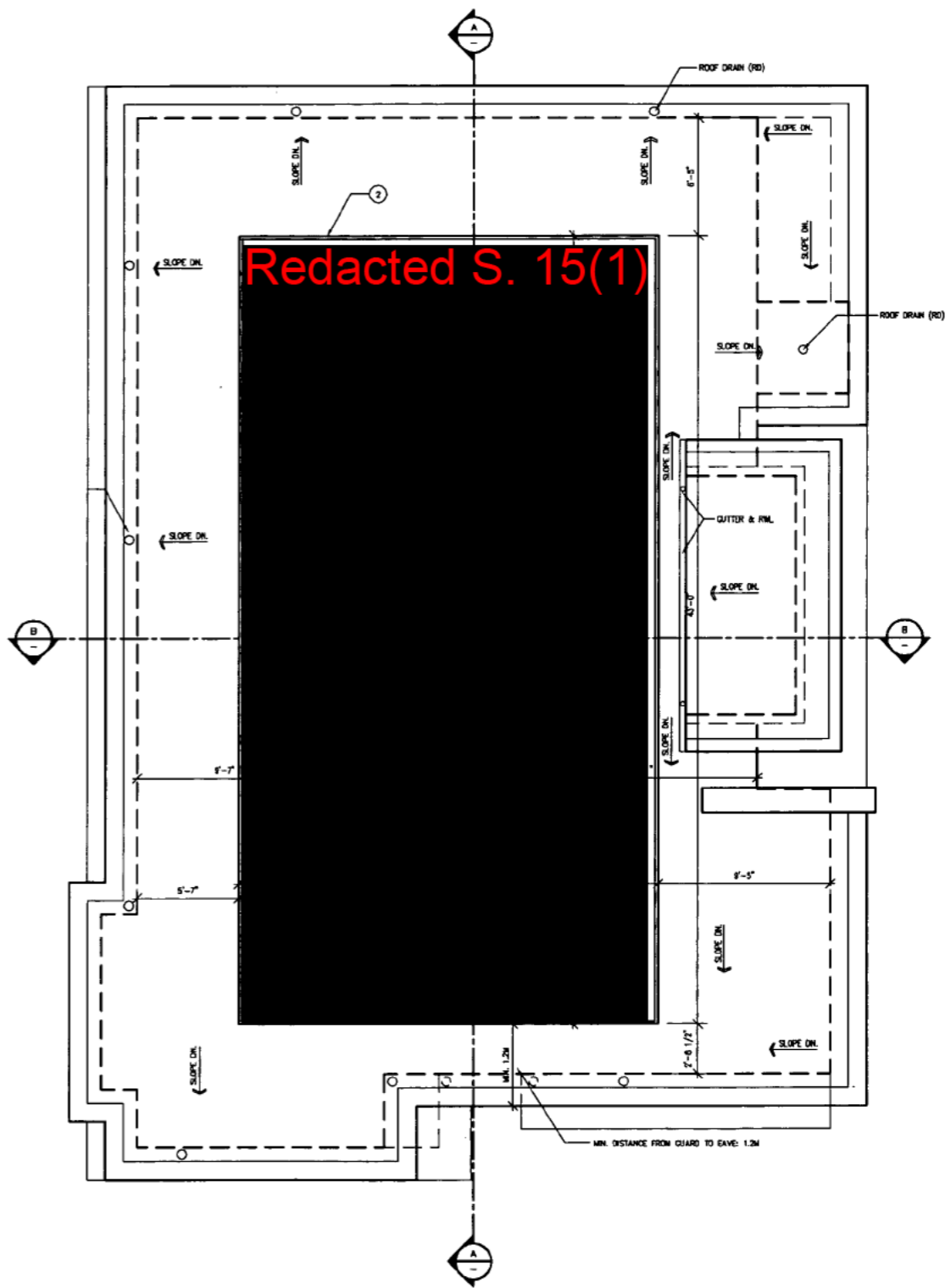
FSR: 3957 S.F.

Redacted S. 15(1)



**SECOND FLOOR PLAN**  
SCALE: 1/8"=1'-0"  
1919 S.F.

Redacted S. 15(1)



**ROOF PLAN**  
SCALE: 1/8"=1'-0"

**CDS**  
**CHEN**  
**DESIGN**  
**STUDIO**  
**LTD.**

3228-8700 Makim Way,  
Richmond, BC V7X 4A5  
Tel. (604) 275-8882  
Fax (604) 909-1736

This drawing shall not be used for construction unless it is countersigned by the CONSULTANT.

Date:	Issued For:						
<table border="1"> <tr> <td style="text-align: center;">A</td> <td>A DETAIL NUMBER</td> </tr> <tr> <td style="text-align: center;">B</td> <td>B LOCATION SHEET</td> </tr> <tr> <td style="text-align: center;">C</td> <td>C DETAIL SHEET</td> </tr> </table>		A	A DETAIL NUMBER	B	B LOCATION SHEET	C	C DETAIL SHEET
A	A DETAIL NUMBER						
B	B LOCATION SHEET						
C	C DETAIL SHEET						

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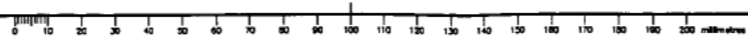
Project:  
**14423 Blackburn Cres.  
Whiterock, B.C.**

14423 Blackburn Cres.  
Whiterock, B.C.

Drawing Title:  
**FLOOR PLANS**

Date:
Scale:
Drawn By:
Checked By:
Project No.:
Drawing No.:

**A3**



Redacted S. 15(1)

CONSTRUCTION NOTES:

ROOF:

R1. WALKING DECK MEMBRANE ON 2 PLY TORCH-ON WATERPROOFING MEMBRANE ON 1/2" T & G PLYWOOD SHEATHING SLOPED TO DRAIN ON 2x4 SLEEPERS ON EDGE (CUT TO SLOPE AT 1/4" IN 1'-0") ON WOOD JOISTS AT 16" (SEE STRUCT.). W/ CROSS BRIDGING AT 7'-0" MAX. W/ R-28 BATT INSULATION ON 6 MIL POLY VAPOUR BARRIER 1/2" G.W.B.(PAINT FINISH)

R2. 5 PLY TAR & GRAVEL BUILT-UP ROOF ON 5/8" T & G PLYWOOD SHEATHING ON 2x4 SLEEPERS ON EDGE (CUT TO SLOPE AT 1/4" IN 1'-0") ON 2x12 WOOD JOISTS AT 16" O.C. W/ CROSS BRIDGING AT 7'-0" MAX. W/ R-28 BATT INSULATION ON 6 MIL POLY VAPOUR BARRIER 1/2" G.W.B.(PAINT FINISH)

R3. METAL ROOF ON NO. 15 PERFORATED ASPHALT SATURATED FELT ON 1/2" T & G PLYWOOD SHEATHING ROOF TRUSSES @ 24" O.C. (PRE-FABRICATED) OR ON RAFTERS @ 16" O.C. W/ MIN. R-40 BATT INSULATION (MIN. R-28 VENTED 1/150 FOR VAULTED ROOFS) 6 MIL POLY VAPOUR BARRIER 1/2" G.W.B.

INTERIOR:

W5. 2x4 WOOD STUDS @ 16" O.C. (8x2" O.C. IF IN BASEMENT) W/ 1/2" G.W.B. BOTH SIDES

FOUNDATION WALL:

W6. (8" ABOVE FIN. GRADE) 5/8" TYPE "X" G.W.B. 6 MIL POLY VAPOUR BARRIER (WARM SIDE) ON 2x8 WOOD STUDS AT 16" O.C. W/ R-22 HIGH DENSITY F.F. BATT INSULATION 1/2" AIR SPACE 6" CON. FOUNDATION WALL W/ DAMPROOFING AT EXTERIOR FACE PARSE ALL EXPOSED CONCRETE

W7. 5/8" TYPE "X" G.W.B. 6 MIL POLY VAPOUR BARRIER (WARM SIDE) ON 2x8 WOOD STUDS AT 16" O.C. W/ R-22 HIGH DENSITY F.F. BATT INSULATION 1/2" AIR SPACE 6" CON. FOUNDATION WALL W/ 2 COATS ASPHALT DAM PROOFING BOTH SIDES WATERPROOF MEMBRANE AND DRAINAGE MAT 1.5" RIGID INSULATION 1/2" PROTECTION BOARD

W8. (AT ACCESS TO BASEMENT...) 5/8" TYPE "X" G.W.B. 6 MIL POLY VAPOUR BARRIER (WARM SIDE) ON 2x8 WOOD STUDS AT 16" O.C. W/ R-22 HIGH DENSITY F.F. BATT INSULATION 1/2" AIR SPACE 6" CON. FOUNDATION WALL

EXTERIOR WALL:

W1. FACE STONE (OR CULTURE STONE) (INSTALLATION METHOD PER MANUFACTURER'S SPEC.) PRESSURE-TREATED 1/2" X 2" PLYWOOD VERTICAL STRAPPING (OVER STUDS BEHIND) WITH RUST RESISTANT FASTENERS, SPACING TO CORRESPOND WITH STUD SPACING, 2 LAYERS 30 MINUTE BUILDING PAPER, INSTALLED IN SHINGLE FASHION 1/2" PLYWOOD EXTERIOR SHEATHING (STAGGERED-LAP), 2x8 WOOD STUDS AT 16" O.C. W/ R-22 BATT INSULATION ON 6 MIL POLY VAPOUR BARRIER (WARM SIDE) ON 5/8" TYPE "X" G.W.B.

W2. PREFINISHED INTERLOCKING METAL PANEL, RECTANGLE PATTERN INSTALLATION PER MANUFACTURER'S SPECIFICATION, PRESSURE-TREATED 1/2" X 2" PLYWOOD VERTICAL STRAPPING (OVER STUDS BEHIND) WITH RUST RESISTANT FASTENERS, SPACING TO CORRESPOND WITH STUD SPACING, 2 LAYERS 30 MINUTE BUILDING PAPER, INSTALLED IN SHINGLE FASHION 1/2" PLYWOOD EXTERIOR SHEATHING (STAGGERED-LAP), 2x8 WOOD STUDS AT 16" O.C. W/ R-22 BATT INSULATION ON 6 MIL POLY VAPOUR BARRIER (WARM SIDE) ON 1/2" G.W.B.

W3. HARDIE SIDING ON PRESSURE-TREATED 1/2" X 2" PLYWOOD VERTICAL STRAPPING (OVER STUDS BEHIND) WITH RUST RESISTANT FASTENERS, SPACING TO CORRESPOND WITH STUD SPACING, 2 LAYERS 30 MINUTE BUILDING PAPER, INSTALLED IN SHINGLE FASHION 1/2" PLYWOOD EXTERIOR SHEATHING (STAGGERED-LAP), 2x8 WOOD STUDS AT 16" O.C. W/ R-22 BATT INSULATION ON 6 MIL POLY VAPOUR BARRIER (WARM SIDE) ON 1/2" G.W.B.

W4. WOOD SIDING ON PRESSURE-TREATED 1/2" X 2" PLYWOOD VERTICAL STRAPPING (OVER STUDS BEHIND) WITH RUST RESISTANT FASTENERS, SPACING TO CORRESPOND WITH STUD SPACING, 2 LAYERS 30 MINUTE BUILDING PAPER, INSTALLED IN SHINGLE FASHION 1/2" PLYWOOD EXTERIOR SHEATHING (STAGGERED-LAP), 2x8 WOOD STUDS AT 16" O.C. W/ R-22 BATT INSULATION ON 6 MIL POLY VAPOUR BARRIER (WARM SIDE) ON 1/2" G.W.B.

FLOOR:

F1. FINISHED FLOOR (PER OWNER'S FINISH SCHEDULES), ON 1 1/2" 25 MPa CONCRETE TOPPING, C/W POLYPROPYLENE FIBRE, ON 5/8" T & G PLYWOOD SUBFLOOR, GLUED/NAILED ON WOOD JOISTS (SEE STRUCT.). W/ CROSS-BRIDGING AT 7'-0" MAX. ON 1/2" G.W.B.

F2. 4" CONC. SLAB ON 6 MILPOLY V.B. ON R12 (UNDER ENTIRE SLAB) 6" COMPACTED SAND FILL

PERIMETER DRAIN:

P1. 6" GRAVEL (DRAIN ROCK) ON 4" DRAIN DRAIN TILES AROUND ALL BUILDINGS

CEDAR WOOD FOR ALL SOFFIT DOORS ON MAIN FLOOR ARE ALL 6'-0" HIGH.

CDS

CHEN DESIGN STUDIO LTD.

3228-8700 McKim Way, Richmond, BC V7X 4A5 Tel. (604) 275-8882 Fax (604) 909-1735

This drawing shall not be used for construction unless it is counter-signed by the CONSULTANT.

Date: Issued For:

A A DETAIL NUMBER B LOCATION SHEET C DETAIL SHEET

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Project:

14423 Blackburn Cres. Whiterock, B.C.

14423 Blackburn Cres. Whiterock, B.C.

Drawing Title:

SECTIONS & CONSTRUCTION NOTES

Date:

Scale:

Drawn By:

Checked By:

Project No.:

Drawing No.:

A5

This drawing is NOT to be scaled. Use figure dimensions only.

1 CROSS SECTION 'A-A' SCALE: 1/4"=1'-0"

Redacted S. 15(1)

7 A6

0 10 20 30 40 50 60 70 80 90 100 110 120 130 140 150 160 170 180 190 200 millimetres

## Carolyne Leveille

---

**From:** Carolyne Leveille  
**Sent:** Thursday, May 09, 2013 11:48 AM  
**To:** alexsong1212@gmail.com  
**Cc:** Guy Gareau  
**Subject:** 14423 Blackburn Cres - Plan review issue  
**Attachments:** SKMBT\_C36013050911410.pdf

Good morning Alex,

Attached please find a scanned copy of the proposed roof hatch c/w plan review notes from the City for your coordination.

The roof hatch as proposed is NOT APPROVED and needs your immediate attention.

Please coordinate this e-mail with the designer as the City does not have his e-mail address.

Kindly provide revised dwgs. at your earliest convenience.

Thank you kindly.

Regards,

**Carolyne G. Léveillé, AT.AIBC**  
Plan Checking Clerk  
Planning & Development Services Department  
p: 604-541-2144  
f: 604-541-2153  
e: [cleveille@whiterockcity.ca](mailto:cleveille@whiterockcity.ca)



**From:** [KonicaMinoltaC360@whiterockcity.ca](mailto:KonicaMinoltaC360@whiterockcity.ca) [<mailto:KonicaMinoltaC360@whiterockcity.ca>]  
**Sent:** Thursday, May 09, 2013 11:42 AM  
**To:** Carolyne Leveille  
**Subject:** Message from KMBT\_C360

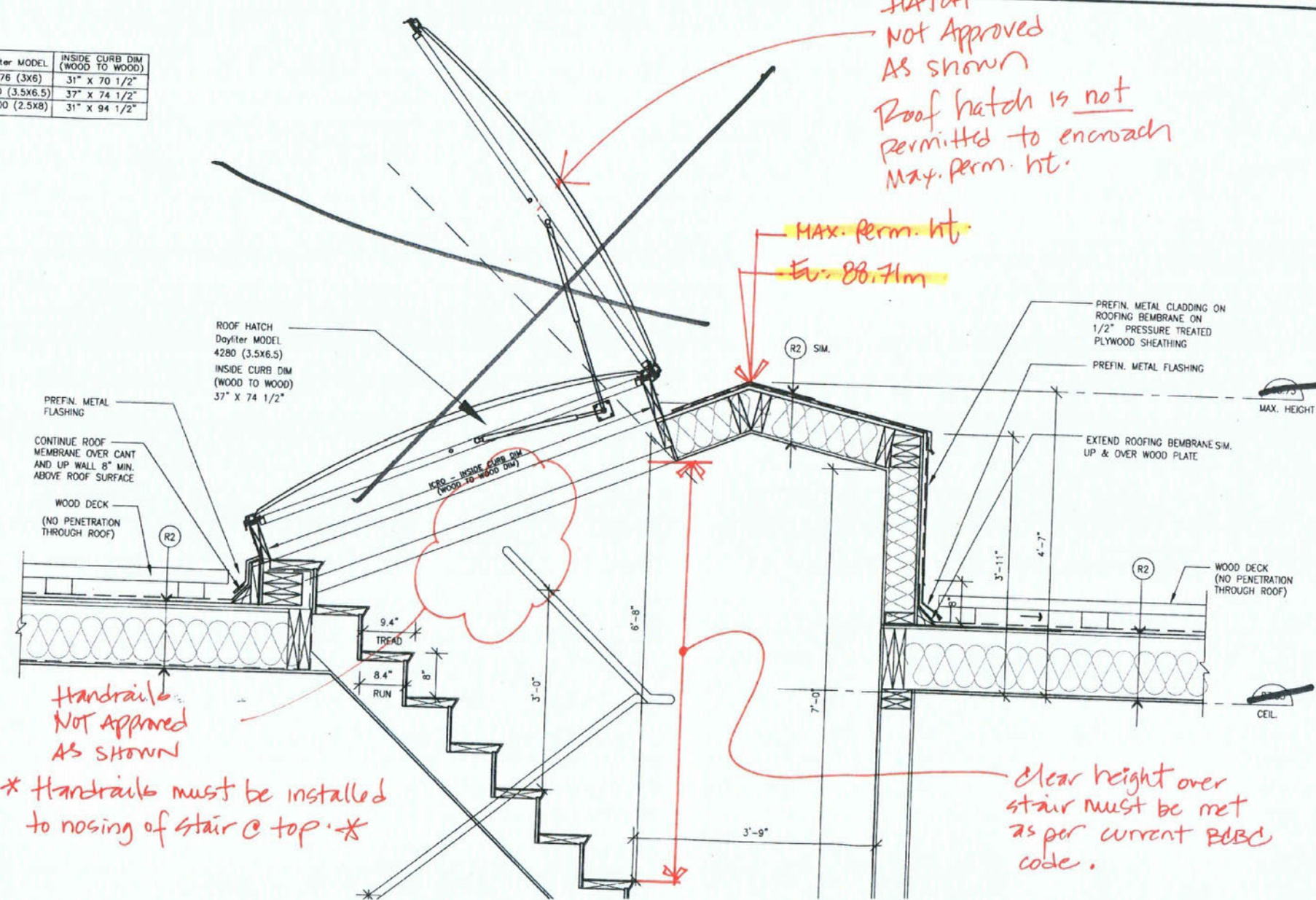


Daylifter MODEL	INSIDE CURB DIM (WOOD TO WOOD)
3676 (3x6)	31" x 70 1/2"
4280 (3.5x6.5)	37" x 74 1/2"
36100 (2.5x8)	31" x 94 1/2"

4 5 6 7 8 inches

HATCH  
 Not Approved  
 AS SHOWN  
 Roof hatch is not  
 permitted to encroach  
 Max. Perm. ht.

MAX. Perm. ht.  
 Ev. 88.71m



Handrails  
 NOT Approved  
 AS SHOWN

\* Handrails must be installed  
 to nosing of stair @ top. \*

Clear height over  
 stair must be met  
 as per current BBBC  
 code.

## Carolyne Leveille

---

**From:** Carolyne Leveille  
**Sent:** Thursday, April 04, 2013 10:20 AM  
**To:** 'alexsong1212@gmail.com'  
**Subject:** FW: Message from KMBT\_C360  
**Attachments:** SKMBT\_C36013040410000.pdf

Good morning,

Thank you for your recent building permit application.

After a quick review the following items are required in order for the City to proceed with their formal permit review.

Kindly provide the following at your earliest convenience;

- ✓1) HPO form *-revid*
- ✓2) \$5,000,000 liability insurance (please refer to attached comments) *-revid*
- ✓3) Signed & sealed rainscreen details from the building envelope engineer *-revid*
- ✓4) Insurance certificate from the sprinkler engineer expires on April 19<sup>th</sup>, City needs new valid certificate after April 19<sup>th</sup> (refer to attached) *-revid*

Thank you.

Regards,

**Carolyne G. Léveill , AT.AIBC**  
Plan Checking Clerk  
Planning & Development Services Department  
p: 604-541-2144  
f: 604-541-2153  
e: [cleveille@whiterockcity.ca](mailto:cleveille@whiterockcity.ca)



**From:** [KonicaMinoltaC360@whiterockcity.ca](mailto:KonicaMinoltaC360@whiterockcity.ca) [mailto:[KonicaMinoltaC360@whiterockcity.ca](mailto:KonicaMinoltaC360@whiterockcity.ca)]  
**Sent:** Thursday, April 04, 2013 10:01 AM  
**To:** Carolyne Leveille  
**Subject:** Message from KMBT\_C360



## Carolyne Leveille

---

**From:** aotto@city.whiterock.bc.ca  
**Sent:** Tuesday, April 09, 2013 12:43 PM  
**To:** Aelicia Otto  
**Cc:** Carolyne Leveille  
**Subject:** Copy of Request for action - -14423 BLACKBURN CRES

You have received the following message because the sender put you in the cc list

---

Hi: Alan

Song,Alex at 14423 BLACKBURN CRES called on 2013-04-09

Telephone Number:

Cellphone Number:

Inquiry Type: Demo Permit

Action Requested: Report

Comments:

There are not any trees on city property to protect. Ok to release demo permit. (ao)

Additional Notes:

\*\* Click on the ADDRESS link to bring up the map.

Click [here](#) to enter the COMPLETION DATE after the job is done.



# Authorization Form

Development Services Department  
15322 Buena Vista Ave., White Rock, B.C. V4B 1Y6  
Phone: 604 541 2136 Fax: 604 541 2153  
Website: [www.whiterockcity.ca](http://www.whiterockcity.ca)

Civic Address: 14423 Blackburn CR

Legal Description: PL 13899 LT 18 LD 36 SEC 10 TWP1

This document shall serve to notify the City of White Rock that I am / we are the legal owner(s) of the property described above and do authorize the person indicated below ("Authorized Agent") to act on my / our behalf on all matters pertaining to the referenced Land / Building Permit Application for the above referenced property. In addition, I / we have read and understand the application requirements of the Land / Building Permit Application and authorize the Authorized Agent to act on our behalf.

Name of Property Owner(s):

**Redacted S. 22**

Mailing Address:

City: **Redacted S. 22** Postal Code: **Redacted S. 22**

E-mail: \_\_\_\_\_

Phone: ( **Redacted S. 22** ) Fax: ( ) \_\_\_\_\_

Name of Authorized Agent:

Alex Song

Company Name:

Ruilida Construction Ltd

Mailing Address:

10931 Ryan Rd

City: Richmond Postal Code: V7A 2G5

E-mail: alexsong1212@gmail.com

Phone: (778) 859-5015 Fax: ( ) \_\_\_\_\_

Signature of Property Owner(s):

**Redacted S. 22**

Date: Mar 10, 2013

Signature of Property Owner(s):

Date: \_\_\_\_\_

Signature of Authorized Agent:

Date: Mar 10, 2013

Note: All registered owners of the property shall sign this Authorization Form. Use additional sheets if necessary. A new Authorization Form shall be submitted to the City of White Rock if the ownership of the property changes prior to completion of issuance of the building permit or before final approval is granted.



*Development Services Department - Memorandum*

<b>To:</b> Alan Markovic	<b>Date:</b> March 27, 2013
<b>From:</b> John Knypstra	<b>Address:</b> 14423 Blackburn Cres.
Dev. Services Dept.	<b>File No.:</b> 13-036

---

**SUBJECT: Building Permit Application – Single Family Dwelling (No Suite)**

---

Greetings Alan

Attached are plans for an application for a Single Family Dwelling for your review with the following information:

Address: 14423 Blackburn Cres.  
Zone: RS-1  
Permit #: 13-036  
Applicant: Alex Song  
Phone: 778 859 5015

If you have any questions, please call me at 2144.

Thanks,

John



## Owners Acknowledgement of Responsibility and Undertakings

Development Services Department  
15322 Buena Vista Ave., White Rock, B.C. V4B 1Y6  
Phone: 604 541 2136 Fax: 604 541 2153  
Website: [www.whiterockcity.ca](http://www.whiterockcity.ca)

### Form "A"

RE: Address: 14423 Blackburn CR

Building Permit Application No.: \_\_\_\_\_

1. I am the owner of the land and premises located at 14423 Blackburn WHITE ROCK BC.
2. I understand and acknowledge that I am fully responsible for carrying out the work or having the work carried out, in accordance with the requirements of the **British Columbia Building Code**, the **Building Bylaw No. 1928** and all other bylaws of the City of White Rock.
3. I will comply with, or cause those whom I employ to comply with the **British Columbia Building Code** and all bylaws of the City of White Rock and other statutes and regulations relating to the development, work, undertaking or permission in respect of which this application is made.
4. I understand and acknowledge that neither the issuance of a permit under **Building Bylaw No. 1928**, the review of plans and supporting documents, nor inspections by a building official shall, in any way, constitute a representation, warranty, or statement that the **British Columbia Building Code**, **Building Bylaw No. 1928**, or any other bylaw of the City of White Rock has been complied with.
5. If the material submitted in support of the application for this Building Permit included certification provided by Registered Professionals in the form of Schedules B-1 and B-2 referred in section 2.6 of Part 2 of the **British Columbia Building Code**, I understand and acknowledge that the City of White Rock and its building officials have relied on those letters of assurance as certification that the design and plans to which they relate comply with the **British Columbia Building Code** and other applicable enactments relating to safety.
6. In particular, I understand and acknowledge that the City of White Rock has relied on the letters of "Assurance of Professional Design and Commitment for Field Review" provided by:
  - Insert the name of the Registered Professionals where applicable below:

Architectural: Chen Design

Building Envelope: Best West Engineers Ltd

Structural: Optimum Engineering Corp.

Mechanical: \_\_\_\_\_

Plumbing: \_\_\_\_\_

Fire Suppression Systems: FKL Engineering Consultants Ltd.

Electrical: \_\_\_\_\_

Geotechnical: \_\_\_\_\_

In reviewing the plans and supporting documentation submitted with this application for a Building Permit.

7. I am authorized to make this acknowledgement of responsibility and give these undertakings to the City of White Rock.
8. I understand that it would be prudent for me to seek independent legal advice with respect to the responsibilities I am assuming upon the granting of a Building Permit by the City of White Rock pursuant to this application and in respect of the execution of this acknowledgement.

Signed this 21 day of March.

**Redacted S. 22**

**Redacted S. 22**

\_\_\_\_\_  
Signature of owner  
(or signing officer if the owner is a corporation)

Signed this 21 day of March.

JY  
Witness

\_\_\_\_\_  
Occupation



## Technical Memorandum

---

**DATE:** March 18, 2013

**TO:** Deborah Servais, EPCOR White Rock Water

**FROM:** Christine Norquist, P.Eng.

**RE:** 1- & 2-DWELLING UNIT BUILDING SERVICING REVIEWS  
Subject Property: 14423 Blackburn Crescent  
Our File 102.066-646

---

### Purpose

EPCOR White Rock Water (EWR) is the water utility for White Rock. The City of White Rock (the City) requires that EWR confirm that proposed developments can be serviced with water prior to the issuance of a building permit. Servicing requirements are as follows:

- Property is reasonably close to a suitable water main;
- Pressures in the nearest water main are suitable for adequate servicing, including sprinkler fire protection (as required by the City's sprinkler bylaw); and
- Existing hydrants are within a reasonable distance to the proposed building and with adequate flow.

This memorandum has been prepared on behalf of EPCOR White Rock Water (EWR) to verify that the proposed building can be serviced from the current system, and to provide design information to allow for sprinkler design by others (where fire protection sprinklers are required). See the attached form provided by the applicant for further details.

### Limitations

The following limitations apply to this servicing review:

- Pressures and fire flows shown are based on output from EWR's hydraulic model of the water system, not actual flow testing.
- Results are expected values (i.e. no safety factors applied). Sprinkler system design should include safety factors as deemed appropriate by the sprinkler system designer.
- Conclusions are based on data provided by the applicant.
- The conclusions in this memorandum are considered valid for a maximum of two years from the date of the memorandum, after which a new servicing review application is required.



## Servicing Summary

	Hydrant Number	Distance to Property <sup>1</sup>	Estimated Fire Flow
<b>Hydrant Fire Protection<sup>2</sup></b>			
Nearest hydrant	#015	35 m	119 L/s
Alternate hydrant #1	#020	100 m	151 L/s
Alternate hydrant #2	#236	140 m	148 L/s
Hydrant fire protection acceptable (i.e. greater than City requirement)?	City to Confirm <sup>3</sup>		
<b>Service Specifics</b>			
Distance from water main to property line	14 m SW of PL		
Total distance to furthest sprinkler head (based on data provided by applicant)	32 m		
<b>Elevations</b>			
Distribution system water main elevation (hydraulic model junction closest to the development)	80 m		
First floor elevation (provided by the applicant)	80 m		
Highest sprinkler head elevation (provided by the applicant)	87 m		
<b>Pressures (for sprinkler system / plumbing design)</b>	HGL <sup>4</sup> (at water main elevation)	W.C. <sup>5</sup>	
Maximum static pressure in water main	144 m	64 m (at first floor elevation)	
Peak hour demand (PHD) pressure in water main	138 m	58 m (at first floor elevation)	
PHD pressure in water main	138 m	51 m (at highest sprinkler elevation)	
PHD pressure adequate for sprinklering (i.e. PHD > 12 m W.C.) <sup>6</sup>	Yes		
Preliminary minimum service size for fire sprinkler system (developer's sprinkler designer to confirm)	38 mm		

<sup>1</sup> Maximum distance to hydrant should be less than 75 m according to EPCOR Design Standards.

<sup>2</sup> Modelled available system fire flow (in water main) at 20 psi residual/zone pressure. Actual flow capability of hydrant and hydrant lead may limit flow capacity in many situations. Hydrant flow is usually limited by the lesser of 100 L/s +/- (typical hydrant flow capacity) or available fire flow as provided here.

<sup>3</sup> F.U.S. guidelines suggest a minimum fire flow of 67 L/s for single-family housing subject to certain requirements.

<sup>4</sup> HGL: Hydraulic grade line at water main elevation.

<sup>5</sup> 1 m W.C. (water column) = 1.42 psi.

<sup>6</sup> Minimum requirement of 12 m W.C., typical desired requirements of 28 m W.C.



## Conclusions

The proposed building can be serviced from the existing EPCOR water system without major system modifications, subject to the following:

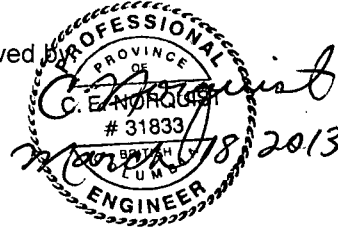
1. Backflow prevention is provided to protect the distribution system;
2. A copy of the plumbing inspection report from the City of White Rock is provided to EPCOR;
3. Proof of satisfactory bacteriological sample results from a qualified lab for the customer service line (from property line) is provided to EPCOR; and
4. The developer should contact EPCOR to confirm next steps based on the conclusions of this memorandum.

### KERR WOOD LEIDAL ASSOCIATES LTD.

Prepared by:

David Ward, EIT  
Junior Project Engineer

Reviewed by:



Christine Norquist, P.Eng.  
Technical Reviewer

DW/  
Encl.

## Statement of Limitations

This document has been prepared by Kerr Wood Leidal Associates Ltd. (KWL) for the exclusive use and benefit of the intended recipient. No other party is entitled to rely on any of the conclusions, data, opinions, or any other information contained in this document.

This document represents KWL's best professional judgement based on the information available at the time of its completion and as appropriate for the project scope of work. Services performed in developing the content of this document have been conducted in a manner consistent with that level and skill ordinarily exercised by members of the engineering profession currently practising under similar conditions. No warranty, express or implied, is made.





RECEIVED  
 MAR 18 2013  
 EPCOR White Rock Water  
 203 - 15261 Russell Avenue  
 White Rock, BC V4B 2P7  
 Tel: (604) 536-6112 Fax: (604) 536-3412

**ONE & TWO DWELLING RESIDENTIAL  
 APPLICATION TO CONFIRM SERVICEABILITY  
 (Required for Building Permit Application)**

Applicant's Address: **Redacted S. 22**  
 Phone Number: **Redacted S. 22**

**PROPOSED DEVELOPMENT DETAILS:**

**Physical Address**  
 (If civic address not available please provide site map) 14423 Blackburn C.R

**Proposed Service Location**  
 (e.g., West PL 3.0 m South of North PL) N/A

**Building Type** (single-family or duplex) Single family

**Current Service Location**  
 (if known) (if not serviced mark - N/A) N/A

**Fire Protection Sprinklers to NFPA 13D Required?**  
**Yes or No** (generally Yes unless otherwise approved by City) Yes

**Setback Distance** (distance from property line to the front of the house, in m) 7.0

**First Floor Elevation**  
 (in m geodetic) 80.13

**Number of Floors**  
 (excluding floor(s) below first floor) 2

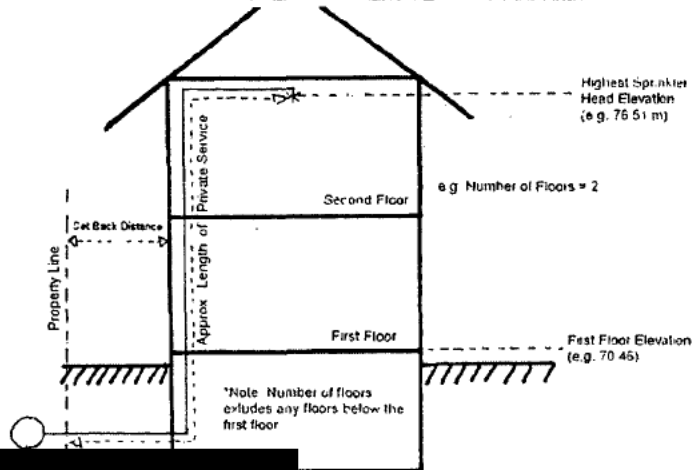
**Highest Sprinkler Head Elevation**  
 (in m geodetic) 87.33

**Approximate Length of Private Service**  
 (from PL to highest sprinkler, actual length of pipe run) 18 m

**Explanation of terms / abbreviations:**

*Elevation or el.* – Elevation in meters in geodetic datum (i.e., referenced to sea level), +/- 1 m.

*PL* – property line, used to reference desired location of service.



O:\0100-0199\102-066\200-General\ApplicationForm11.docx

**Redacted S. 22**

Name of Applicant

Date

Mar 18, 2013

LAND TITLE ACT  
**STATE OF TITLE CERTIFICATE**

000016

TONY LIU NOTARY CORPORATION  
912 WEST KING EDWARD AVENUE  
VANCOUVER BC V5Z 2E2

YOUR FILE NUMBER:  
12-10375

LAND TITLE DISTRICT: NEW WESTMINSTER, BRITISH COLUMBIA

CERTIFICATE NO: STSR1083044

TITLE NO: CA2924854

THIS IS TO CERTIFY THAT AT 05:44 ON 05 FEBRUARY, 2013,  
THE STATE OF THE TITLE TO THE LAND DESCRIBED HEREIN IS AS STATED  
AND IS SUBJECT TO THE NOTATIONS APPEARING BELOW. THIS CERTIFICATE  
IS TO BE READ SUBJECT TO THE PROVISIONS OF SECTION 23(2) OF  
THE LAND TITLE ACT (R.S.B.C. 1996 CHAPTER 250) AND MAY BE AFFECTED BY  
SECTIONS 50 AND 55-58 OF THE LAND ACT (R.S.B.C. 1996 CHAPTER 245).

  
REGISTRAR

APPLICATION FOR REGISTRATION RECEIVED ON: 20 DECEMBER, 2012  
ENTERED: 24 DECEMBER, 2012

REGISTERED OWNER IN FEE SIMPLE:

**Redacted S. 22**

TAXATION AUTHORITY:  
CITY OF WHITE ROCK

DESCRIPTION OF LAND:  
PARCEL IDENTIFIER: 009-864-512  
LOT 18 SECTION 10 TOWNSHIP 1 NEW WESTMINSTER DISTRICT PLAN 13899

LEGAL NOTATIONS: NONE

CHARGES, LIENS AND INTERESTS:

NATURE OF CHARGE	CHARGE NUMBER	DATE	TIME
------------------	---------------	------	------

MORTGAGE	CA2924855	2012-12-20	09:16
REGISTERED OWNER OF CHARGE:	THE BANK OF NOVA SCOTIA		
	CA2924855		

DUPLICATE INDEFEASIBLE TITLE: NONE OUTSTANDING

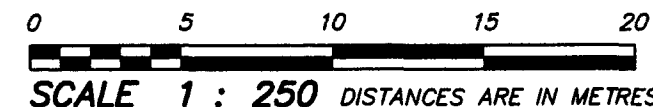
TRANSFERS: NONE

PENDING APPLICATIONS: NONE



**TOPOGRAPHICAL SURVEY PLAN OF LOT 18**  
**SECTION 10 TOWNSHIP 1**  
**NWD PLAN 13899**

PID : 009-864-512



**CIVIC ADDRESS :**

14423 - BLACKBURN CRESCENT  
 WHITE ROCK, B.C.

**NOTE :**

ALL ELEVATIONS SHOWN ARE  
 TAKEN AT NATURAL GROUND ✓

**ELEVATION DERIVATION**

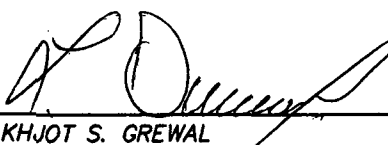
ELEVATIONS ARE GEODETIC DERIVED FROM CITY  
 OF WHITE ROCK CONTROL MONUMENT  
 No. 88H3910 ELEVATION=79.622m  
 DATUM NAD83 (CSRS) 2005

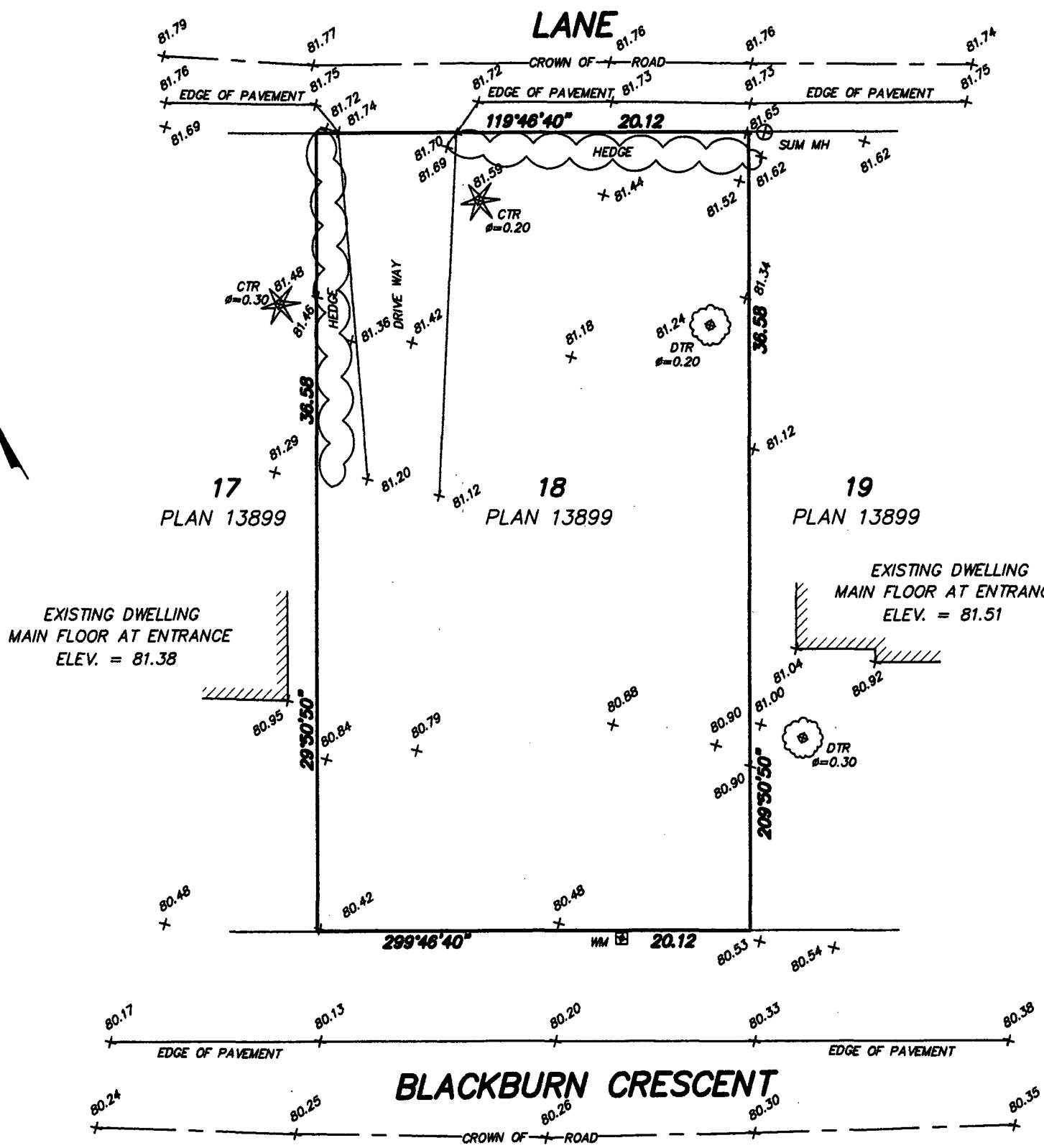
Lot dimensions and clearances according to  
 Field Survey.

This plan does not show non-plan  
 charges, liens or interests.

This plan was prepared for inspection purposes and is  
 for the exclusive use of our client. The signatory  
 accepts no responsibility or liability for any damages  
 that may be suffered by a third party as a result of  
 any decisions made or actions taken based on this  
 document. This documents shows the relative location  
 of the surveyed structures and features with respect to  
 the boundaries of the parcel described above. This  
 document shall not be used to define property lines or  
 property corners. All rights reserved. No person may  
 copy, reproduce, transmit or alter this document in  
 whole or in part without the consent of the signatory.

THIS TOPOGRAPHICAL SURVEY HAS BEEN PREPARED  
 IN ACCORDANCE WITH THE MANUAL OF STANDARD PRACTICE  
 AND IS CERTIFIED CORRECT THIS 15th DAY OF JANUARY, 2013.

  
 LAKHJOT S. GREWAL B.C.L.S.



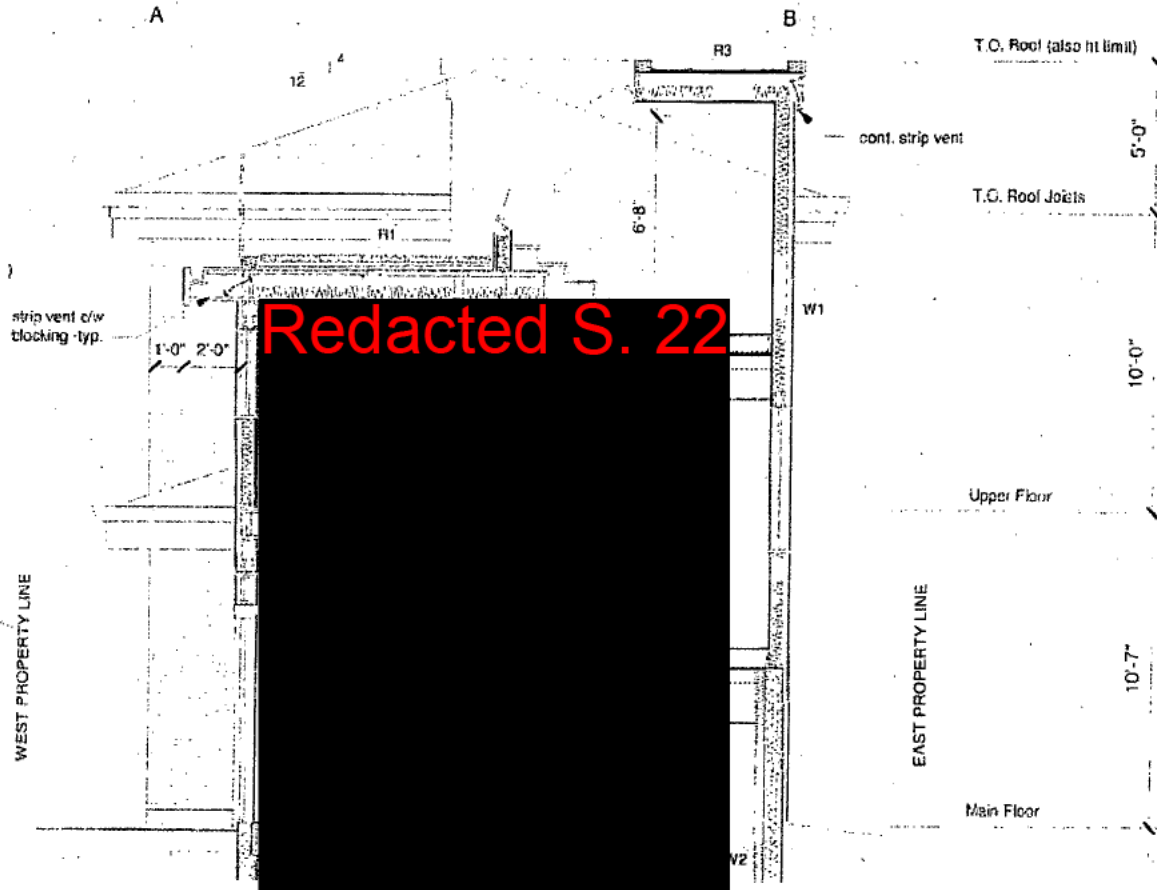
**LEGEND :**

- SUM MH ⊕ DENOTES SUMP MANHOLE
- WM ⊠ DENOTES WATER METER
- CTR ⋆ DENOTES CONIFEROUS TREE
- DTR ⊗ DENOTES DECIDUOUS TREE

© GREWAL & ASSOCIATES  
 PROFESSIONAL LAND SURVEYORS  
 UNIT 204, 15299-68th AVENUE  
 SURREY, B.C. V3S 2C1  
 TEL: 604-597-8567  
 EMAIL: Office@GrewalSurveys.com  
 FILE : 1301-006  
 DWG : 1301-006 T1

# ACCESS TO ROOF TOP DECK

DEC 11/09



## OFFICE policy:

- 1) Handrails must be installed to nosing of stair @ top.
- 2) Clear height over stair must be met as per current BCBC code.

O.K. ~~JW~~ Dec 11/09

## Water Pipe Sizing for Single Family Dwellings and Duplexes

		BASEMENT	MAIN FL.	UPPER FL.	TOTAL
TOILET	X3			4	10
BASIN	X1			5	7
SHOWER HEAD	X2	—	—	2	4
2 SHOWER HEAD	X3	—	—	—	—
BATHTUB	X2		—	4	10
KITCHEN SINK	X2	—	2	—	4
BAR SINK	X2		—	—	2
DISHWASHER	X3	—		—	3
HOSE BIB	X3	—	2	—	6
LAUNDRY TUB	X2		—	—	2
WASHER (LDRY.)	X3		—	—	3

**LEGEND:**

1/2" = 11 FIX. UNITS  
 3/4" = 40 FIX. UNITS  
 1" = 90 FIX. UNITS  
 1 1/4" = 225 FIX. UNITS

1"  $\phi$  min. size req'd

59



**TOPOGRAPHICAL SURVEY PLAN OF LOT 18  
SECTION 10 TOWNSHIP 1  
NWD PLAN 13899**

PID : 009-864-512

**CIVIC ADDRESS :**

14423 - BLACKBURN CRESCENT  
WHITE ROCK, B.C.

**NOTE :**

ALL ELEVATIONS SHOWN ARE  
TAKEN AT NATURAL GROUND

**ELEVATION DERIVATION**

ELEVATIONS ARE GEODETIC DERIVED FROM CITY  
OF WHITE ROCK CONTROL MONUMENT  
No. 88H3910 ELEVATION=79.622m  
DATUM NAD83 (CSRS) 2005

Lot dimensions and clearances according to  
Field Survey.

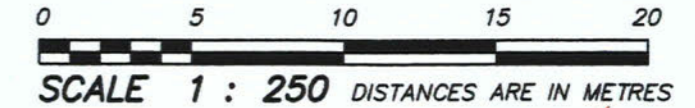
This plan does not show non-plan  
charges, liens or interests.

This plan was prepared for inspection purposes and is  
for the exclusive use of our client. The signatory  
accepts no responsibility or liability for any damages  
that may be suffered by a third party as a result of  
any decisions made or actions taken based on this  
document. This document shows the relative location  
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the boundaries of the parcel described above. This  
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property corners. All rights reserved. No person may  
copy, reproduce, transmit or alter this document in  
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AND IS CERTIFIED CORRECT THIS 15th DAY OF JANUARY, 2013.

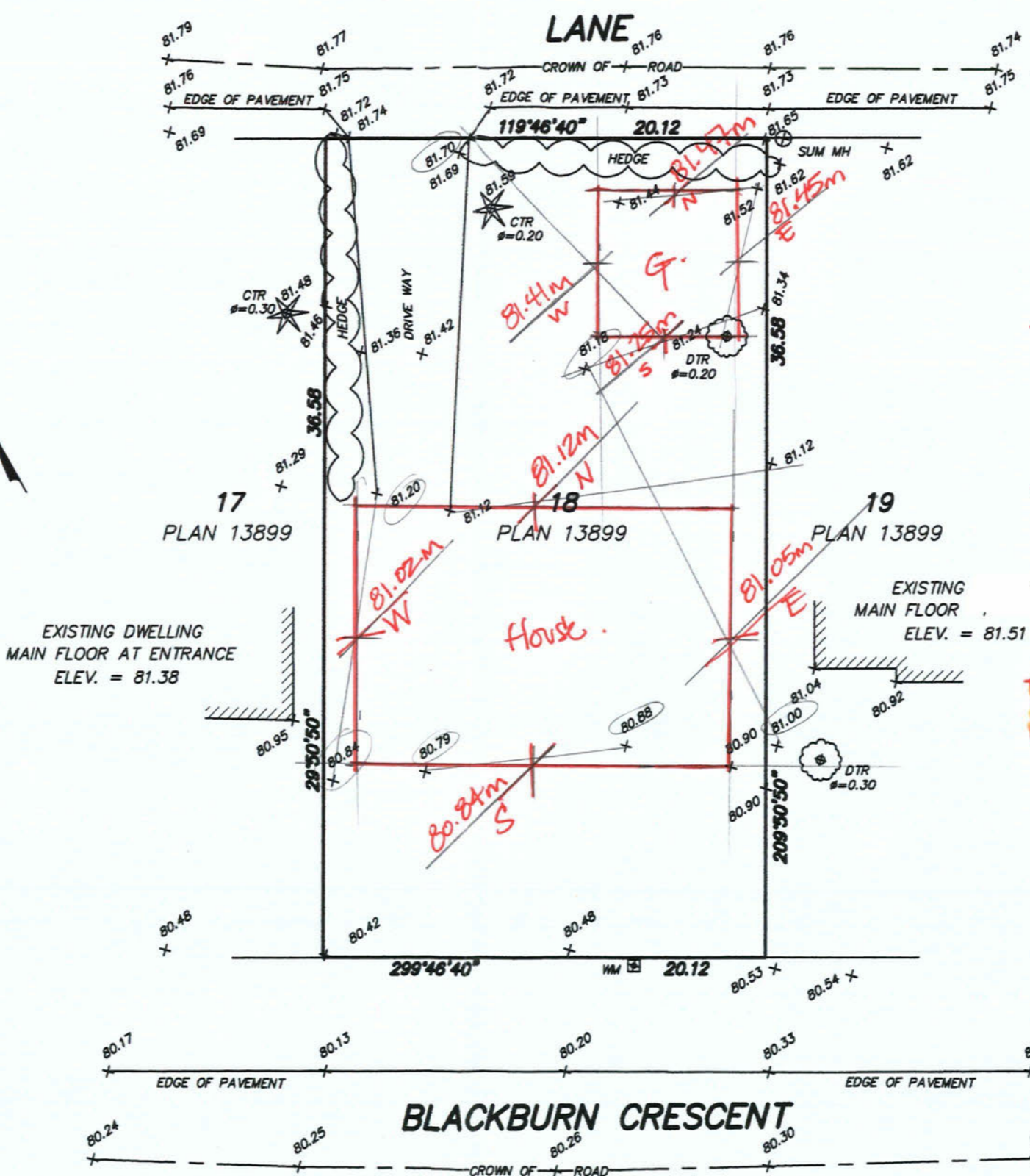
  
LAKHJOT S. GREWAL

B.C.L.S.



14423 Blackburn Cres.  
R5-1  
FP# 13-036  
Max. Perm. HT.

House :	Garage :
N - 81.12m	N - 81.47m
S - 80.84m	S - 81.25m
E - 81.05m	E - 81.45m
W - 81.02m	W - 81.41m
$\div 4$	$\div 4$
AVG - 81.01m	AVG - 81.40m
+ 7.7m	+ 4.0m
<b>MPH - 88.71m</b>	<b>MPH - 85.40m</b>
House	Garage



**LEGEND :**

- SUM MH ⊕ DENOTES SUMP MANHOLE
- WM ⊠ DENOTES WATER METER
- CTR ★ DENOTES CONIFEROUS TREE
- DTR ⊙ DENOTES DECIDUOUS TREE

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PROFESSIONAL LAND SURVEYORS  
UNIT 204, 15299-68th AVENUE  
SURREY, B.C. V3S 2C1  
TEL: 604-597-8567  
EMAIL: Office@GrewalSurveys.com  
FILE : 1301-006  
DWG : 1301-006 T1



14423 Blackburn Crs. - RSI - BP# 13-036

Max. Perm. Ht. - HOUSE

North -  $\boxed{81.12m}$  given

South -  $(80.88 + 80.79) \div 2 = \boxed{80.84m}$

East -  $\begin{array}{r} 81.18 \\ 81.00 \\ \hline 0.18 \end{array} \quad \frac{17 \times 0.18}{24} = \boxed{81.05m}$

West -  $(81.20 + 80.84) \div 2 = \boxed{81.02m}$

$$= \frac{324.03}{4}$$

$81.01m$  Avg  
+ 7.7

$\boxed{88.71m}$  MPA (HOUSE)

Max. Perm. Ht. - GARAGE

North -  $\begin{array}{r} 81.52 \\ 81.44 \\ \hline 0.08 \end{array} \quad \frac{5 \times 0.08}{8} = \boxed{81.47m}$

West -  $\frac{10 \times 0.46}{16}$   
 $\begin{array}{r} 81.70 \\ 81.24 \\ \hline 0.46 \end{array} = \boxed{81.41m}$

South -  $\begin{array}{r} 81.34 \\ 81.18 \\ \hline 0.16 \end{array} \quad \frac{6 \times 0.16}{11} = \boxed{81.25m}$

East -  $\begin{array}{r} 81.62 \\ 81.24 \\ \hline 0.38 \end{array} \quad \frac{4 \times 0.38}{9} = \boxed{81.45m}$

Schedule A.

BRITISH COLUMBIA BUILDING CODE 2012

#13036

SCHEDULE A

Forming Part of Sentence 2.2.7.2.(1), Div. C of the British Columbia Building Code

Building Permit No. (for authority having jurisdiction's use)

CONFIRMATION OF COMMITMENT BY OWNER AND COORDINATING REGISTERED PROFESSIONAL

- Notes: (i) This letter must be submitted before issuance of a building permit. (ii) This letter is endorsed by: Architectural Institute of B.C., Association of Professional Engineers and Geoscientists of B.C., Building Officials' Association of B.C., and Union of B.C. Municipalities. (iii) In this letter the words in italics have the same meaning as in the British Columbia Building Code.

Re: Design and Field Review of Construction by a Coordinating Registered Professional

To: The authority having jurisdiction CITY OF WHITE ROCK

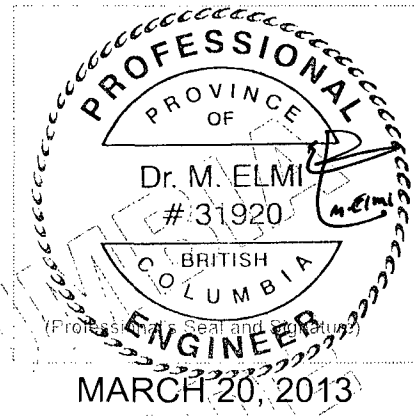
Name of Jurisdiction (Print)

Re: SINGLE FAMILY DWELLING

Name of Project (Print)

14423 BLACKBURN CRESCENT

Address of Project (Print)



MARCH 20, 2013

Date

MEHDI ELMI, P. ENG.

The undersigned has retained MEHDI ELMI, P. ENG. as a coordinating registered professional to coordinate the design work and field reviews of the registered professionals of record required for this project. The coordinating registered professional shall coordinate the design work and field reviews of the registered professionals of record required for the project in order to ascertain that the design will substantially comply with the B.C. Building Code and other applicable enactments respecting safety and that the construction of the project will substantially comply with the B.C. Building Code and other applicable enactments respecting safety, not including the construction safety aspects.

"field reviews" are defined in the British Columbia Building Code to mean those reviews of the work

- (a) at a project site of a development to which a building permit relates, and (b) where applicable, at fabrication locations where building components are fabricated for use at the project site

that a registered professional of record in his or her professional discretion considers necessary to ascertain whether the work substantially complies in all material respects with the plans and supporting documents prepared by the registered professional of record for which the building permit is issued.

The owner and the coordinating registered professional have read Subsection 2.2.7, Division C of the British Columbia Building Code. The owner and the coordinating registered professional each acknowledge their responsibility to notify the addressee of this letter of the date the coordinating registered professional ceases to be retained by the owner before the date the coordinating registered professional ceases to be retained or, if that is not possible, then as soon as possible. The coordinating registered professional acknowledges the responsibility to notify the addressee of this letter of the date a registered professional of record ceases to be retained before the date the registered professional of record ceases to be retained or, if that is not possible, then as soon as possible.

It is the responsibility of the coordinating registered professional to ascertain which registered professionals of record are required, and to initial each Schedule B.



BRITISH COLUMBIA BUILDING CODE 2012

Schedule A – Continued

# 13036

Building Permit No.  
(for authority having jurisdiction's use)

14423 BLACKBURN CRESCENT, WHITE ROCK, BC

Project Address

The owner and the coordinating registered professional understand that where the coordinating registered professional or a registered professional of record ceases to be retained at any time during construction, work on the above project will cease until such time as

- (a) a new coordinating registered professional or registered professional of record, as the case may be, is retained, and
- (b) a new letter in the form set out in Schedule A or in the form set out in Schedules B, as the case may be, is filed with the authority having jurisdiction.

The undersigned coordinating registered professional certifies that he or she is a registered professional as defined in the British Columbia Building Code, and agrees to coordinate the design work and field reviews of the registered professionals of record required for the project as outlined in the attached Schedules B including coordination and integration of functional testing of fire protection and life safety systems. (See A-2.2.7.3 in Appendix A.)

Coordinating Registered Professional

MEHDI ELMI, P. ENG.

Coordinating Registered Professional's Name (Print)

211- 3030 LINCOLN AVENUE, COQUITLAM, BC, V3B 6B4

Address (Print)

OFFICE: 604.468.7304/ CELL: 604.767.2991

Phone No.

Owner

Redacted S. 22

Name of Agent or Signing Officer if applicable (Print)

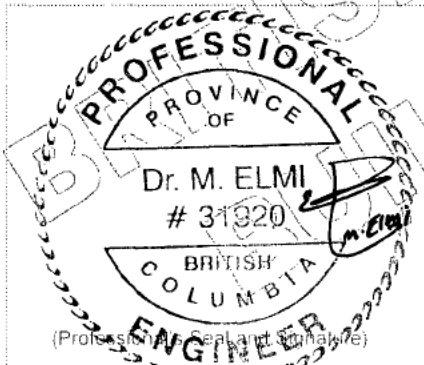
MARCH 20, 2013

Date

Redacted S. 22

(If owner is a  
be given here.

If the signature is that of the agent, a copy of the document that appoints the agent must be attached.)



(Professional Seal and Signature)

MARCH 20, 2013

Date

(If the Coordinating Registered Professional is a member of a firm, complete the following.)

I am a member of the firm BEST WEST ENGINEERS LTD.  
and I sign this letter on behalf of the firm (Print name of firm)

This letter must be signed by the owner or the owner's appointed agent and by the coordinating registered professional. An agent's letter of appointment must be attached. If the owner is a corporation, the letter must be signed by a signing officer of the corporation and the signing officer must set forth his or her position in the corporation.

The British Columbia Building Code defines a registered professional to mean

- (a) a person who is registered or licensed to practise as an architect under the Architects Act, or
- (b) a person who is registered or licensed to practise as a professional engineer under the Engineers and Geoscientists Act.

SPUT/ucotech

BRITISH COLUMBIA BUILDING CODE 2012

SCHEDULE B

Forming Part of Subsection 2.2.7, Div. C of the British Columbia Building Code

# 1 3 0 3 6

Building Permit No. (for authority having jurisdiction's use)

ASSURANCE OF PROFESSIONAL DESIGN AND COMMITMENT FOR FIELD REVIEW

- Notes: (i) This letter must be submitted prior to the commencement of construction activities... (ii) This letter is endorsed by: Architectural Institute of B.C., Association of Professional Engineers and Geoscientists of B.C., Building Officials' Association of B.C., and Union of B.C. Municipalities. (iii) In this letter the words in italics have the same meaning as in the British Columbia Building Code.

To: The authority having jurisdiction

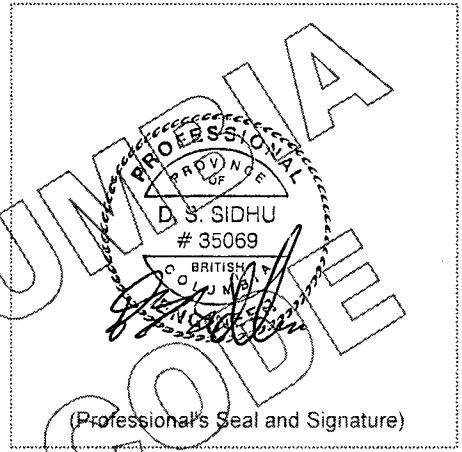
The City of White Rock Name of Jurisdiction (Print)

Re: Single Family Dwelling & Detached Garage Name of Project (Print)

14423-Blackburn Crescent White Rock, BC. Address of Project (Print)

The undersigned hereby gives assurance that the design of the (Initial those of the items listed below that apply to this registered professional of record. All the disciplines will not necessarily be employed on every project.)

- ARCHITECTURAL
STRUCTURAL
MECHANICAL
PLUMBING
FIRE SUPPRESSION SYSTEMS
ELECTRICAL
GEOTECHNICAL - temporary
GEOTECHNICAL - permanent



(Professional's Seal and Signature)

03/11/2013 Date

components of the plans and supporting documents prepared by this registered professional of record in support of the application for the building permit as outlined below substantially comply with the B.C. Building Code and other applicable enactments respecting safety except for construction safety aspects.

The undersigned hereby undertakes to be responsible for field reviews of the above referenced components during construction, as indicated on the "SUMMARY OF DESIGN AND FIELD REVIEW REQUIREMENTS" below.

ME CRP's Initials

BRITISH COLUMBIA BUILDING CODE 2012

Schedule B - Continued

Building Permit No.  
(for authority having jurisdiction's use)

14423-Blackburn Crescent White Rock, BC.  
Project Address

Structural & Geotechnical only  
Discipline

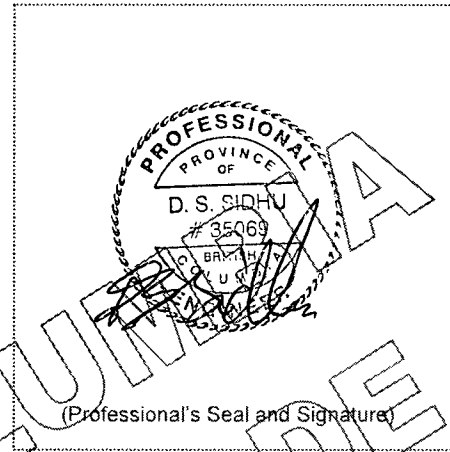
The undersigned also undertakes to notify the authority having jurisdiction in writing as soon as possible if the undersigned's contract for field review is terminated at any time during construction.

I certify that I am a registered professional as defined in the British Columbia Building Code.

Deepinder Sidhu, P.Eng.  
Registered Professional of Record's Name (Print)

#127, 13714-67 Avenue  
Address (Print)  
Surrey, BC. V3W 6X6

604-700-8153  
Phone No.



(Professional's Seal and Signature)

03/11/2013

Date

(If the Registered Professional of Record is a member of a firm, complete the following.)

I am a member of the firm Optimum Engineering Corp.  
and I sign this letter on behalf of the firm. (Print name of firm)

Note: The above letter must be signed by a registered professional of record, who is a registered professional. The British Columbia Building Code defines a registered professional to mean

- (a) a person who is registered or licensed to practise as an architect under the Architects Act, or
- (b) a person who is registered or licensed to practise as a professional engineer under the Engineers and Geoscientists Act.

ME

CRP's Initials

Schedule B - Continued

# 1 3 0 3 6

Building Permit No.  
(for authority having jurisdiction's use)

14423-Blackburn Crescent White Rock, BC.  
Project Address

Structural & Geotechnical only  
Discipline

**SUMMARY OF DESIGN AND FIELD REVIEW REQUIREMENTS**

(Initial applicable discipline below and cross out and initial only those items not applicable to the project.)

**ARCHITECTURAL**

- 1.1 Fire resisting assemblies
- 1.2 Fire separations and their continuity
- 1.3 Closures, including tightness and operation
- 1.4 Egress systems, including access to exit within suites and floor areas
- 1.5 Performance and physical safety features (guardrails, handrails, etc.)
- 1.6 Structural capacity of architectural components, including anchorage and seismic restraint
- 1.7 Sound control
- 1.8 Landscaping, screening and site grading
- 1.9 Provisions for fire fighting access
- 1.10 Access requirements for persons with disabilities
- 1.11 Elevating devices
- 1.12 Functional testing of architecturally related fire emergency systems and devices
- 1.13 Development Permit and conditions therein
- 1.14 Interior signage, including acceptable materials, dimensions and locations
- 1.15 Review of all applicable shop drawings
- 1.16 Interior and exterior finishes
- 1.17 Dampproofing and/or waterproofing of walls and slabs below grade
- 1.18 Roofing and flashings
- 1.19 Wall cladding systems
- 1.20 Condensation control and cavity ventilation
- 1.21 Exterior glazing
- 1.22 Integration of building envelope components
- 1.23 Environmental separation requirements (Part 5)
- 1.24 Building Envelope, Part 10/ASHRAE Requirements



(Professional's Seal and Signature)

03/11/2013

Date

**STRUCTURAL**

- 2.1 Structural capacity of structural components of the building, including anchorage and seismic restraint
- ~~2.2 Structural aspects of deep foundations~~
- 2.3 Review of all applicable shop drawings
- ~~2.4 Structural aspects of unbonded post-tensioned concrete design and construction~~

**MECHANICAL**

- 3.1 HVAC systems and devices, including high building requirements where applicable
- 3.2 Fire dampers at required fire separations
- 3.3 Continuity of fire separations at HVAC penetrations
- 3.4 Functional testing of mechanically related fire emergency systems and devices
- 3.5 Maintenance manuals for mechanical systems
- 3.6 Structural capacity of mechanical components, including anchorage and seismic restraint
- 3.7 Review of all applicable shop drawings
- 3.8 Mechanical Systems, Part 10/ASHRAE Requirements

ME

CRP's Initials

Schedule B - *Continued*

Building Permit No.  
(for authority having jurisdiction's use)

14423-Blackburn Crescent White Rock, BC.  
Project Address

**Structural & Geotechnical only**  
Discipline

**PLUMBING**

- 4.1 Roof *drainage systems*
- 4.2 Site and foundation *drainage systems*
- 4.3 *Plumbing systems* and devices
- 4.4 Continuity of *fire separations* at plumbing penetrations
- 4.5 Functional testing of plumbing related fire emergency systems and devices
- 4.6 Maintenance manuals for *plumbing systems*
- 4.7 Structural capacity of plumbing components, including anchorage and seismic restraint
- 4.8 Review of all applicable shop drawings
- 4.9 Plumbing Systems, Part 10 requirements

**FIRE SUPPRESSION SYSTEMS**

- 5.1 Suppression system classification for type of *occupancy*
- 5.2 Design coverage, including concealed or special areas
- 5.3 Compatibility and location of electrical supervision, ancillary alarm and control devices
- 5.4 Evaluation of the capacity of city (municipal) water supply versus system demands and domestic demand, including pumping devices where necessary
- 5.5 Qualification of welder, quality of welds and material
- 5.6 Review of all applicable shop drawings
- 5.7 Acceptance testing for "Contractor's Material and Test Certificate" as per NFPA Standards
- 5.8 Maintenance program and manual for suppression systems
- 5.9 Structural capacity of sprinkler components, including anchorage and seismic restraint
- 5.10 For partial systems — confirm sprinklers are installed in all areas where required
- 5.11 Fire Department connections and hydrant locations
- 5.12 Fire hose standpipes
- 5.13 Freeze protection measures for fire suppression systems
- 5.14 Functional testing of fire suppression systems and devices

**ELECTRICAL**

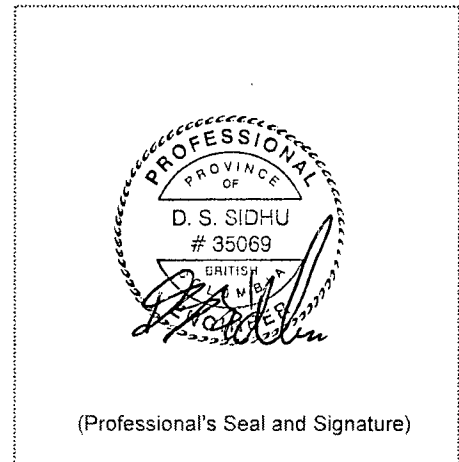
- 6.1 Electrical systems and devices, including high building requirements where applicable
- 6.2 Continuity of *fire separations* at electrical penetrations
- 6.3 Functional testing of electrical related fire emergency systems and devices
- 6.4 Electrical systems and devices maintenance manuals
- 6.5 Structural capacity of electrical components, including anchorage and seismic restraint
- 6.6 Clearances from *buildings* of all electrical utility equipment
- 6.7 Fire protection of wiring for emergency systems
- 6.8 Review of all applicable shop drawings
- 6.9 Electrical Systems, Part 10/ASHRAE requirements

**GEOTECHNICAL — Temporary**

- 7.1 *Excavation*
- 7.2 ~~Shoring~~
- 7.3 ~~Underpinning~~
- 7.4 ~~Temporary construction dewatering~~

**GEOTECHNICAL — Permanent**

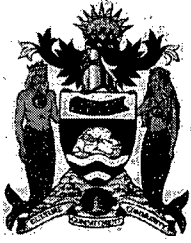
- 8.1 Bearing capacity of the soil
- 8.2 ~~Geotechnical aspects of deep foundations~~
- 8.3 ~~Compaction of engineered fill~~
- 8.4 ~~Structural considerations of soil, including slope stability and seismic loading~~
- 8.5 ~~Backfill~~
- 8.6 ~~Permanent dewatering~~
- 8.7 ~~Permanent underpinning~~



03/11/2013

Date

*ME*  
CRP's Initials



THE CORPORATION OF THE  
**CITY OF WHITE ROCK**  
 15322 BUENA VISTA AVENUE, WHITE ROCK, B.C. V4B 1Y6

DEVELOPMENT SERVICES DEPARTMENT TEL: (604)541-2136 FAX: (604)541-2153

**FORM 'B'**

**PROOF OF PROFESSIONAL LIABILITY INSURANCE**

**RE: Address:** 14423-Blackburn Crescent White Rock, BC.

**Building Permit Application No.:** # 1 3 0 3 6

The undersigned hereby gives assurance that:

- a) I have fulfilled my obligation to obtain a subsisting policy of professional liability or errors and omissions insurance as outlined in section 16.3 of **Building Bylaw No. 1782.**
- b) I have enclosed a copy of my certificate of insurance indicating the particulars of such coverage.
- c) I am a registered professional as defined under Section 1.4 of the British Columbia Building Code.
- d) I will notify the Building Official immediately if this insurance coverage is reduced, expired or terminated at any time during construction.

Signed this 11 day of March-2013.

D. S. Sidhu

**Print Name of Registered Professional**

*[Handwritten Signature]*

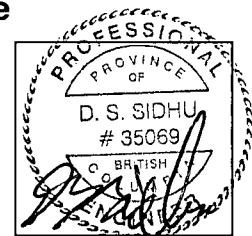
**Signature of Registered Professional**

Structural

**Professional's Discipline**

**Professional's seal**

or



Signed this \_\_\_\_\_ day of \_\_\_\_\_.

**Witness Signature**



# Certificate of Insurance

No. OPT-2013-1

Dated: January 22, 2013

This document supersedes any certificate previously issued under this number

This is to certify that the Policy(ies) of insurance listed below ("Policy" or "Policies") have been issued to the Named Insured identified below for the policy period(s) indicated. This certificate is issued as a matter of information only and confers no rights upon the Certificate Holder named below other than those provided by the Policy(ies).

Notwithstanding any requirement, term or condition of any contract or any other document with respect to which this certificate may be issued or may pertain, the insurance afforded by the Policy(ies) is subject to all the terms, conditions and exclusions of such Policy(ies). This certificate does not amend, extend or alter the coverage afforded by the Policy(ies). Limits shown are intended to address contractual obligations of the Named Insured.

Limits may have been reduced since Policy effective date(s) as a result of a claim or claims.

**Certificate Holder:**

To Whom It May Concern

**Named Insured and Address:**

Optimum Engineering Corp.  
13714 - 67 Avenue  
Unit 127  
Surrey, BC V3W 6X6

# 1 3 0 3 6

**This certificate is issued regarding:**

Evidence of Insurance

Type(s) of Insurance	Insurer(s)	Policy Number(s)	Effective/ Expiry Dates	Sums Insured Or Limits of Liability	
PROFESSIONAL LIABILITY • Claims Made Policy	Berkley Insurance Company	BC15000032	Jan 14, 2013 to Jan 14, 2014	Each Claim	\$ 5,000,000
				Aggregate	\$ 5,000,000

**Notice of cancellation:**

The insurer(s) affording coverage under the policies described herein will not notify the certificate holder named herein of the cancellation of such coverage.

**Marsh Canada Limited**

800 - 550 Burrard Street  
Vancouver, BC V6C 2K1  
Telephone: 604-692-4840  
Fax: 604-685-3112  
michael.nikkel@marsh.com

Marsh Canada Limited

By: Michael Nikkel

BEP

# BRITISH COLUMBIA BUILDING CODE 2012

## SCHEDULE B

Forming Part of Subsection 2.2.7, Div. C of the  
British Columbia Building Code

### # 1 3 0 3 6

Building Permit No.  
(for authority having jurisdiction's use)

### ASSURANCE OF PROFESSIONAL DESIGN AND COMMITMENT FOR FIELD REVIEW

- Notes: (i) This letter must be submitted prior to the commencement of construction activities of the components identified below. A separate letter must be submitted by each *registered professional of record*.
- (ii) This letter is endorsed by: Architectural Institute of B.C., Association of Professional Engineers and Geoscientists of B.C., Building Officials' Association of B.C., and Union of B.C. Municipalities.
- (iii) In this letter the words in italics have the same meaning as in the British Columbia Building Code.

To: The *authority having jurisdiction*

CITY OF WHITE ROCK

Name of Jurisdiction (Print)

Re: SINGLE FAMILY DWELLING

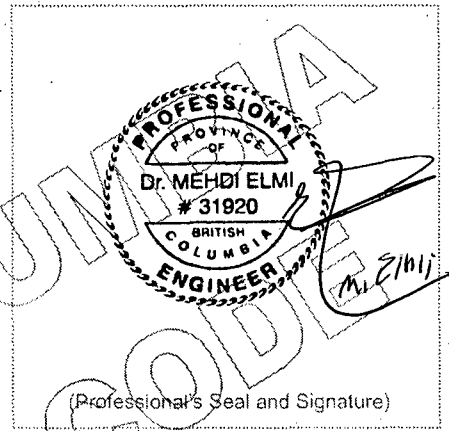
Name of Project (Print)

14423 BLACKBURN CRESCENT, WHITE ROCK

Address of Project (Print)

The undersigned hereby gives assurance that the design of the  
(Initial those of the items listed below that apply to this *registered professional of record*. All the disciplines will not necessarily be employed on every project.)

- ME  ARCHITECTURAL (*BUILDING ENVELOPE*)
- ME  STRUCTURAL
- ME  MECHANICAL
- ME  PLUMBING
- ME  FIRE SUPPRESSION SYSTEMS
- ME  ELECTRICAL
- ME  GEOTECHNICAL — temporary
- ME  GEOTECHNICAL — permanent



(Professional's Seal and Signature)

MARCH 20, 2013

Date

components of the plans and supporting documents prepared by this *registered professional of record* in support of the application for the *building permit* as outlined below, substantially comply with the B.C. Building Code and other applicable enactments respecting safety except for construction safety aspects.

The undersigned hereby undertakes to be responsible for *field reviews* of the above referenced components during construction, as indicated on the "SUMMARY OF DESIGN AND FIELD REVIEW REQUIREMENTS" below.

ME  
CRP's Initials



BRITISH COLUMBIA BUILDING CODE 2012

Schedule B - Continued

Building Permit No.  
(for authority having jurisdiction's use)

14423 BLACKBURN CRESCENT, WHITE ROCK, BC

Project Address

ARCHITECTURAL(BUILDING ENVELOPE)

Discipline

The undersigned also undertakes to notify the authority having jurisdiction in writing as soon as possible if the undersigned's contract for field review is terminated at any time during construction.

I certify that I am a registered professional as defined in the British Columbia Building Code.

MEHDI ELMI, P.ENG.

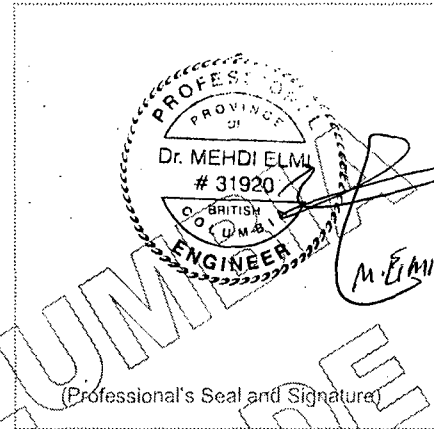
Registered Professional of Record's Name (Print)

211-3030 LINCOLN AVENUE, COQUITLAM, BC, V3B 6B4

Address (Print)

OFFICE: 604.468.7304 / CELL: 604.767.2991

Phone No.



(Professional's Seal and Signature)

Date

(If the Registered Professional of Record is a member of a firm, complete the following.)

I am a member of the firm **BEST WEST ENGINEERS LTD.**

and I sign this letter on behalf of the firm. (Print name of firm)

Note: The above letter must be signed by a registered professional of record, who is a registered professional. The British Columbia Building Code defines a registered professional to mean

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ME

CRP's Initials

BRITISH COLUMBIA BUILDING CODE 2012

Schedule B - Continued

#13036

Building Permit No.  
(for authority having jurisdiction's use)

14423 BLACKBURNS CRESCENT  
WHITE ROCK, BC

Project Address

ARCHITECTURAL (BUILDING ENVELOPE)

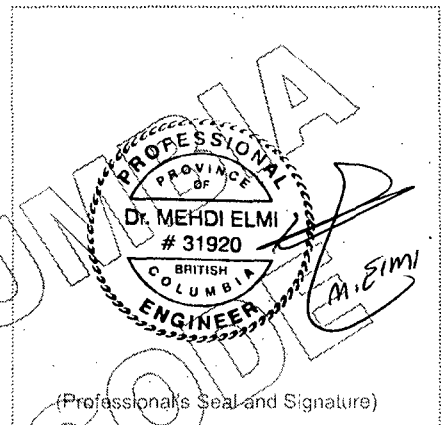
Discipline

SUMMARY OF DESIGN AND FIELD REVIEW REQUIREMENTS

(Initial applicable discipline below and cross out and initial only those items not applicable to the project.)

~~MEV~~ ARCHITECTURAL

- 1.1 Fire resisting assemblies
- 1.2 Fire separations and their continuity
- 1.3 Closures, including tightness and operation
- 1.4 Egress systems, including access to exit within suites and floor areas
- 1.5 Performance and physical safety features (guardrails, handrails, etc.)
- 1.6 Structural capacity of architectural components, including anchorage and seismic restraint
- 1.7 Sound control
- 1.8 Landscaping, screening and site grading
- 1.9 Provisions for fire fighting access
- 1.10 Access requirements for persons with disabilities
- 1.11 Elevating devices
- 1.12 Functional testing of architecturally related fire emergency systems and devices
- 1.13 Development Permit and conditions therein
- 1.14 Interior signage, including acceptable materials, dimensions and locations
- MEV 1.15 Review of all applicable shop drawings
- MEV 1.16 Interior and exterior finishes
- MEV 1.17 Dampproofing and/or waterproofing of walls and slabs below grade
- MEV 1.18 Roofing and flashings
- MEV 1.19 Wall cladding systems
- MEV 1.20 Condensation control and cavity ventilation
- MEV 1.21 Exterior glazing
- MEV 1.22 Integration of building envelope components
- MEV 1.23 Environmental separation requirements (Part 5)
- 1.24 Building Envelope, Part 10/ASHRAE Requirements



(Professional's Seal and Signature)

MARCH 20, 2013

Date

~~ME~~ STRUCTURAL

- 2.1 Structural capacity of structural components of the building, including anchorage and seismic restraint
- 2.2 Structural aspects of deep foundations
- 2.3 Review of all applicable shop drawings
- 2.4 Structural aspects of unbonded post-tensioned concrete design and construction

~~ME~~ MECHANICAL

- 3.1 HVAC systems and devices, including high building requirements where applicable
- 3.2 Fire dampers at required fire separations
- 3.3 Continuity of fire separations at HVAC penetrations
- 3.4 Functional testing of mechanically related fire emergency systems and devices
- 3.5 Maintenance manuals for mechanical systems
- 3.6 Structural capacity of mechanical components, including anchorage and seismic restraint
- 3.7 Review of all applicable shop drawings
- 3.8 Mechanical Systems, Part 10/ASHRAE Requirements

ME

CRP's Initials

# BRITISH COLUMBIA BUILDING CODE 2012

Schedule B - *Continued*

Building Permit No.  
(for authority having jurisdiction's use)

14423 BLACKBURN CRESCENT, WHITE ROCK, BC

Project Address

ARCHITECTURAL (BUILDING ENVELOPE)

Discipline

## PLUMBING

- 4.1 Roof drainage systems
- 4.2 Site and foundation drainage systems
- 4.3 Plumbing systems and devices
- 4.4 Continuity of fire separations at plumbing penetrations
- 4.5 Functional testing of plumbing related fire emergency systems and devices
- 4.6 Maintenance manuals for plumbing systems
- 4.7 Structural capacity of plumbing components, including anchorage and seismic restraint
- 4.8 Review of all applicable shop drawings
- 4.9 Plumbing Systems, Part 10 requirements

## FIRE SUPPRESSION SYSTEMS

- 5.1 Suppression system classification for type of occupancy
- 5.2 Design coverage, including concealed or special areas
- 5.3 Compatibility and location of electrical supervision, ancillary alarm and control devices
- 5.4 Evaluation of the capacity of city (municipal) water supply versus system demands and domestic demand, including pumping devices where necessary
- 5.5 Qualification of welder, quality of welds and material
- 5.6 Review of all applicable shop drawings
- 5.7 Acceptance testing for "Contractor's Material and Test Certificate", as per NFPA Standards
- 5.8 Maintenance program and manual for suppression systems
- 5.9 Structural capacity of sprinkler components, including anchorage and seismic restraint
- 5.10 For partial systems — confirm sprinklers are installed in all areas where required
- 5.11 Fire Department connections and hydrant locations
- 5.12 Fire hose standpipes
- 5.13 Freeze protection measures for fire suppression systems
- 5.14 Functional testing of fire suppression systems and devices

## ELECTRICAL

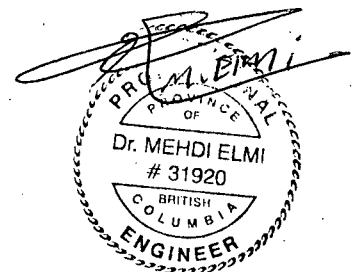
- 6.1 Electrical systems and devices, including high building requirements where applicable
- 6.2 Continuity of fire separations at electrical penetrations
- 6.3 Functional testing of electrical related fire emergency systems and devices
- 6.4 Electrical systems and devices maintenance manuals
- 6.5 Structural capacity of electrical components, including anchorage and seismic restraint
- 6.6 Clearances from buildings of all electrical utility equipment
- 6.7 Fire protection of wiring for emergency systems
- 6.8 Review of all applicable shop drawings
- 6.9 Electrical Systems, Part 10/ASHRAE requirements

## GEOTECHNICAL — Temporary

- 7.1 Excavation
- 7.2 Shoring
- 7.3 Underpinning
- 7.4 Temporary construction dewatering

## GEOTECHNICAL — Permanent

- 8.1 Bearing capacity of the soil
- 8.2 Geotechnical aspects of deep foundations
- 8.3 Compaction of engineered fill
- 8.4 Structural considerations of soil, including slope stability and seismic loading
- 8.5 Backfill
- 8.6 Permanent dewatering
- 8.7 Permanent underpinning



(Professional's Seal and Signature)

MARCH 20, 2013

Date

ME  
CRP's Initials

BRITISH COLUMBIA BUILDING CODE 2012

SCHEDULE B

Forming Part of Subsection 2.2.7, Div. C of the British Columbia Building Code

# 13036

Building Permit No. (for authority having jurisdiction's use)

ASSURANCE OF PROFESSIONAL DESIGN AND COMMITMENT FOR FIELD REVIEW

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To: The authority having jurisdiction

CITY OF WHITE ROCK

Name of Jurisdiction (Print)

Re: SINGLE FAMILY DWELLING

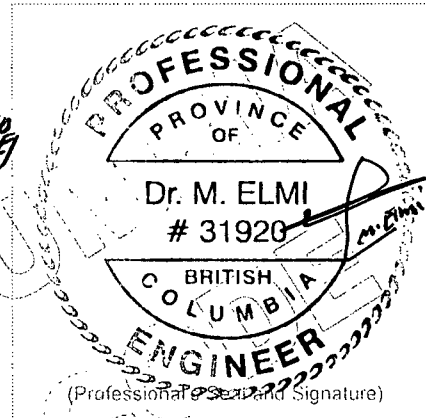
Name of Project (Print)

14423 BLACKBURN CRESCENT, WHITE ROCK, BC

Address of Project (Print)

The undersigned hereby gives assurance that the design of the (Initial those of the items listed below that apply to this registered professional of record. All the disciplines will not necessarily be employed on every project.)

- ME ARCHITECTURAL (BUILDING ENVELOPE)
ME STRUCTURAL
ME MECHANICAL
ME PLUMBING
ME FIRE SUPPRESSION SYSTEMS
ME ELECTRICAL
ME GEOTECHNICAL - temporary
ME GEOTECHNICAL - permanent



MARCH 20, 2013

Date

components of the plans and supporting documents prepared by this registered professional of record in support of the application for the building permit as outlined below, substantially comply with the B.C. Building Code and other applicable enactments respecting safety except for construction safety aspects.

The undersigned hereby undertakes to be responsible for field reviews of the above referenced components during construction, as indicated on the 'SUMMARY OF DESIGN AND FIELD REVIEW REQUIREMENTS' below.

ME

CRP's Initials

BRITISH COLUMBIA BUILDING CODE 2012

Schedule B - Continued

# 13036

Building Permit No.  
(for authority having jurisdiction's use)

14423 BLACKBURN CRESCENT, WHITE ROCK, BC

Project Address

ARCHITECTURAL(BUILDING ENVELOPE)

Discipline

The undersigned also undertakes to notify the authority having jurisdiction in writing as soon as possible if the undersigned's contract for field review is terminated at any time during construction.

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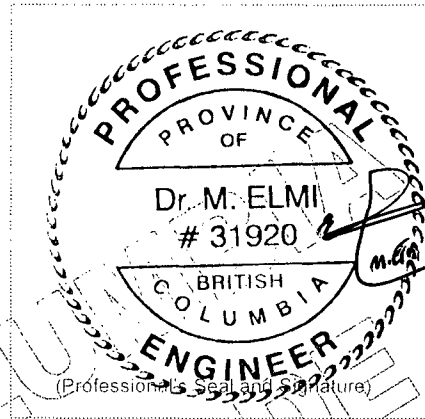
Registered Professional of Record's Name (Print)

211-3030 LINCOLN AVENUE, COQUITLAM, BC, V3B 6B4

Address (Print)

OFFICE: 604.468.7304 /CELL: 604.767.2991

Phone No.



MARCH 20, 2013

Date

(If the Registered Professional of Record is a member of a firm, complete the following.)

I am a member of the firm BEST WEST ENGINEERS LTD.

and I sign this letter on behalf of the firm (Print name of firm)

Note: The above letter must be signed by a registered professional of record, who is a registered professional. The British Columbia Building Code defines a registered professional to mean

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ME

CRP's Initials

BRITISH COLUMBIA BUILDING CODE 2012

Schedule B - Continued

#13036

Building Permit No.  
(for authority having jurisdiction's use)

14423 BLACKBURN CRESCENT, WHITE ROCK, BC

Project Address

ARCHITECTURAL(BUILDING ENVELOPE)

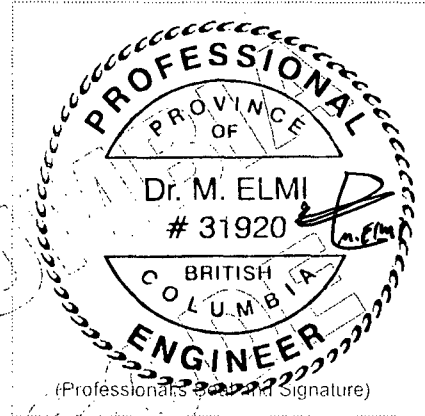
Discipline

SUMMARY OF DESIGN AND FIELD REVIEW REQUIREMENTS

(Initial applicable discipline below and cross out and initial only those items not applicable to the project.)

ME ✓ ARCHITECTURAL

- 1.1 Fire resisting assemblies
- 1.2 Fire separations and their continuity
- 1.3 Closures, including tightness and operation
- 1.4 Egress systems, including access to exit within suites and floor areas
- 1.5 Performance and physical safety features (guardrails, handrails, etc.)
- 1.6 Structural capacity of architectural components, including anchorage and seismic restraint
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- 1.10 Access requirements for persons with disabilities
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- MEV 1.21 Exterior glazing
- MEV 1.22 Integration of building envelope components
- MEV 1.23 Environmental separation requirements (Part 5)
- ME 1.24 Building Envelope, Part 10/ASHRAE Requirements



MARCH 20, 2013

Date

STRUCTURAL

- 2.1 Structural capacity of structural components of the building, including anchorage and seismic restraint
- 2.2 Structural aspects of deep foundations
- 2.3 Review of all applicable shop drawings
- 2.4 Structural aspects of unbonded post-tensioned concrete design and construction

ME MECHANICAL

- 3.1 HVAC systems and devices, including high building requirements where applicable
- 3.2 Fire dampers at required fire separations
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- 3.5 Maintenance manuals for mechanical systems
- 3.6 Structural capacity of mechanical components, including anchorage and seismic restraint
- 3.7 Review of all applicable shop drawings
- 3.8 Mechanical Systems, Part 10/ASHRAE Requirements

ME

CRP's Initials

BRITISH COLUMBIA BUILDING CODE 2012

Schedule B - Continued

# 13036

Building Permit No.  
(for authority having jurisdiction's use)

14423 BLACKBURN CRESCENT, WHITE ROCK, BC

Project Address

ARCHITECTURAL (BUILDING ENVELOPE)

Discipline

**PLUMBING**

- 4.1 Roof drainage systems
- 4.2 Site and foundation drainage systems
- 4.3 Plumbing systems and devices
- 4.4 Continuity of fire separations at plumbing penetrations
- 4.5 Functional testing of plumbing related fire emergency systems and devices
- 4.6 Maintenance manuals for plumbing systems
- 4.7 Structural capacity of plumbing components, including anchorage and seismic restraint
- 4.8 Review of all applicable shop drawings
- 4.9 Plumbing Systems, Part 10 requirements

**FIRE SUPPRESSION SYSTEMS**

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- 5.2 Design coverage including concealed or special areas
- 5.3 Compatibility and location of electrical supervision, ancillary alarm and control devices
- 5.4 Evaluation of the capacity of city (municipal) water supply versus system demands and domestic demand, including pumping devices where necessary
- 5.5 Qualification of welder, quality of welds and material
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- 5.7 Acceptance testing for "Contractor's Material and Test-Certificate" as per NFPA Standards
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- 5.9 Structural capacity of sprinkler components, including anchorage and seismic restraint
- 5.10 For partial systems — confirm sprinklers are installed in all areas where required
- 5.11 Fire Department connections and hydrant locations
- 5.12 Fire hose standpipes
- 5.13 Freeze protection measures for fire suppression systems
- 5.14 Functional testing of fire suppression systems and devices

**ELECTRICAL**

- 6.1 Electrical systems and devices, including high building requirements where applicable
- 6.2 Continuity of fire separations at electrical penetrations
- 6.3 Functional testing of electrical related fire emergency systems and devices
- 6.4 Electrical systems and devices maintenance manuals
- 6.5 Structural capacity of electrical components, including anchorage and seismic restraint
- 6.6 Clearances from buildings of all electrical utility equipment
- 6.7 Fire protection of wiring for emergency systems
- 6.8 Review of all applicable shop drawings
- 6.9 Electrical Systems, Part 10/ASHRAE requirements

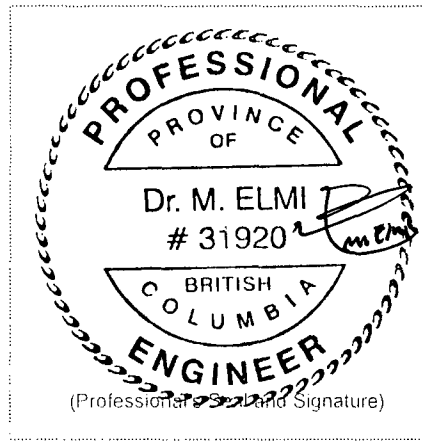
**GEOTECHNICAL — Temporary**

- 7.1 Excavation
- 7.2 Shoring
- 7.3 Underpinning
- 7.4 Temporary construction dewatering

**GEOTECHNICAL — Permanent**

- 8.1 Bearing capacity of the soil
- 8.2 Geotechnical aspects of deep foundations
- 8.3 Compaction of engineered fill
- 8.4 Structural considerations of soil, including slope stability and seismic loading
- 8.5 Backfill
- 8.6 Permanent dewatering
- 8.7 Permanent underpinning

ME



MARCH 20, 2013

Date

ME  
CRP's Initials

**Proof of Professional  
Liability Insurance**

Planning and Development Services Department  
15322 Buena Vista Ave., White Rock, B.C. V4B 1Y6  
Phone: 604 541 2136 Fax: 604 541 2153  
Website: [www.whiterockcity.ca](http://www.whiterockcity.ca)

Form "B"

RE: Address: 14423 Blackburn Crs. # 13036  
Building Permit Application No.: \_\_\_\_\_

The undersigned hereby gives assurance that:

- a) I have fulfilled my obligation to obtain a subsisting policy of professional liability or errors and omissions insurance as outlined in the City of White Rock **Building Bylaw**.
- b) I have enclosed a copy of my certificate of insurance indicating the particulars of such coverage.
- c) I am a registered professional as defined under Section 1.4 of the British Columbia Building Code.
- d) I will notify the Building Official immediately if this insurance coverage is reduced, expired or terminated at any time during construction.

Signed this 20 day of March 2013.

MEHDI ELMi, P. Eng.

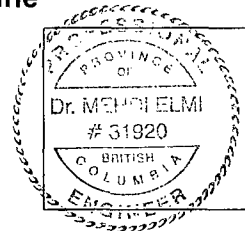
Print Name of Registered Professional

  
Signature of Registered Professional

ARCHITECTURAL (BUILDING ENVELOPE)  
Professional's Discipline

Professional's seal

or



Signed this \_\_\_\_\_ day of \_\_\_\_\_.

Witness Signature





WEST 3RD STREET

**INSURANCE COVER NOTE**

# 1 3 0 3 6

**E. & O.E.**

This document is evidence that Insurance described herein has been effected, against which Insurers' policy or policies will be issued. In the event of any inconsistency in the terms and conditions as set forth in this document and those contained in the policy or policies, the latter shall prevail.

Policy Number: PSB01034749

Names & Mailing: Best West Engineers Ltd.  
211 - 3030 Lincoln Ave  
Coquitlam, BCV3B 6B4

Type of Insurance: Professional Liability Insurance Policy

Amount of Limits:	Errors & Omissions Liability:	\$500,000
	Aggregate Limit of Liability	\$500,000
	Policy Deductible	\$5000


Effective: September 7<sup>th</sup>, 2012 to September 7<sup>th</sup>, 2013

Insurers Subscribing Hereto: CAN-SURE UNDERWRITING LTD. through Lloyd's of London

**THIS POLICY IS SUBJECT TO THE STANDARD MORTGAGE CLAUSE**

Dated at North Vancouver, BC this December 14, 2012

**SUSSEX INSURANCE AGENCY INC.**

PER:   
**Authorized Representative**

**THIS POLICY CONTAINS CLAUSES  
THAT MAY LIMIT THE AMOUNT PAYABLE**

## DECLARATIONS

**LLOYD'S**

ERRORS AND OMISSIONS, PROPERTY AND  
COMMERCIAL GENERAL LIABILITY INSURANCE  
CFC UNDERWRITING LIMITED  
85 GRACECHURCH STREET  
LONDON EC3V 0AA  
UNITED KINGDOM

POLICY NUMBER: PSB01034749

THE INSURED: BEST WEST ENGINEERS LTD

ADDRESS: 211-3030 Lincoln Ave  
Coquitlam BC V3B 6B4  
Canada

NAME OF LICENSED CANADIAN INTERMEDIARY: Can-Sure Underwriting Ltd

THE UNDERWRITERS: Underwritten by certain Underwriters at Lloyd's

THE INCEPTION DATE: 00:01 Local Standard Time on 07 Sep 2012

THE EXPIRY DATE: 00:01 Local Standard Time on 07 Sep 2013

TOTAL PAYABLE: CAD2,750.00

Broken down as follows:

Premium: CAD2,500.00

Policy Administration Fee: CAD250.00

OPTIONAL EXTENDED REPORTING PREMIUM (in respect of Insuring Clauses 1 & 2): CAD2,500  
(only payable if you choose to exercise this option)

BUSINESS ACTIVITIES: structural, geotechnical and civil engineering and as more fully described in the application form dated 21 Aug 2012 and as held on file by CFC Underwriting Limited

LEGAL ACTION: Worldwide

RETROACTIVE DATE (in respect of Insuring Clauses 1 & 2): 07 Sep 2012

CLAIMS MANAGERS: CFC Underwriting Limited  
Please report all new claims to:  
newclaims@cfunderwriting.com

WORDING: A&E CAN v1.7

ENDORSEMENTS: ENGLISH LANGUAGE AGREEMENT CLAUSE  
PREMIUM PAYMENT CLAUSE  
ABSOLUTE ASBESTOS EXCLUSION CLAUSE  
ABSOLUTE TOXIC MOULD EXCLUSION CLAUSE  
POLLUTION EXCLUSION CLAUSE  
CONDOMINIUM PROJECTS EXCLUSION

#13036

Sprinkler.

BRITISH COLUMBIA BUILDING CODE 2012

SCHEDULE B

Forming Part of Subsection 2.2.7, Div. C of the British Columbia Building Code

#13036

Building Permit No. (for authority having jurisdiction's use)

ASSURANCE OF PROFESSIONAL DESIGN AND COMMITMENT FOR FIELD REVIEW

- Notes: (i) This letter must be submitted prior to the commencement of construction activities of the components identified below. A separate letter must be submitted by each registered professional of record. (ii) This letter is endorsed by: Architectural Institute of B.C., Association of Professional Engineers and Geoscientists of B.C., Building Officials' Association of B.C., and Union of B.C. Municipalities. (iii) In this letter the words in italics have the same meaning as in the British Columbia Building Code.

To: The authority having jurisdiction

City of White Rock.

Name of Jurisdiction (Print)

Re: SFD

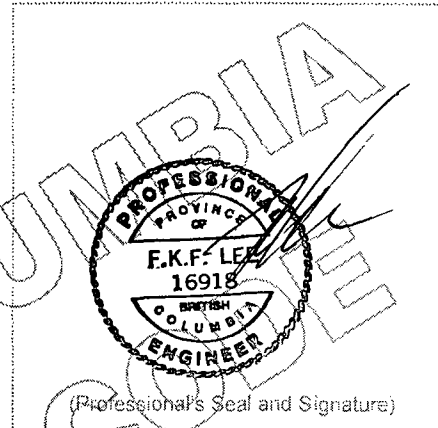
Name of Project (Print)

14423 Blackburn Cres., White Rock.

Address of Project (Print)

The undersigned hereby gives assurance that the design of the (Initial those of the items listed below that apply to this registered professional of record. All the disciplines will not necessarily be employed on every project.)

- ARCHITECTURAL
STRUCTURAL
MECHANICAL
PLUMBING
FIRE SUPPRESSION SYSTEMS
ELECTRICAL
GEOTECHNICAL - temporary
GEOTECHNICAL - permanent



(Professional's Seal and Signature)

MAR 25 2013

Date

components of the plans and supporting documents prepared by this registered professional of record in support of the application for the building permit as outlined below, substantially comply with the B.C. Building Code and other applicable enactments respecting safety except for construction safety aspects.

The undersigned hereby undertakes to be responsible for field reviews of the above referenced components during construction, as indicated on the "SUMMARY OF DESIGN AND FIELD REVIEW REQUIREMENTS" below.

CRP's Initials

BRITISH COLUMBIA BUILDING CODE 2012

Schedule B - Continued

Building Permit No.  
(for authority having jurisdiction's use)

14423 Blackburn Cres. WR

Project Address

Fire Suppression Systems

Discipline

The undersigned also undertakes to notify the authority having jurisdiction in writing as soon as possible if the undersigned's contract for field review is terminated at any time during construction.

I certify that I am a registered professional as defined in the British Columbia Building Code.

Fred Lee

Registered Professional of Record's Name (Print)

3571 Worthington Dr., Vancouver, V5M 3Y1

Address (Print)

604-618-0438

Phone No.



(Professional's Seal and Signature)

MAR 25 2013

Date

(If the Registered Professional of Record is a member of a firm, complete the following.)

I am a member of the firm and I sign this letter on behalf of the firm.

FKL Engineering

(Print name of firm)

Note: The above letter must be signed by a registered professional of record, who is a registered professional. The British Columbia Building Code defines a registered professional to mean

- (a) a person who is registered or licensed to practise as an architect under the Architects Act, or
- (b) a person who is registered or licensed to practise as a professional engineer under the Engineers and Geoscientists Act.

CRP's Initials

# BRITISH COLUMBIA BUILDING CODE 2012

Schedule B - *Continued*

# 13036

Building Permit No.  
(for authority having jurisdiction's use)

14423 Blackburn Cres. WR  
Project Address

Fire Suppression Systems

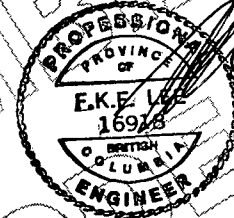
Discipline

## SUMMARY OF DESIGN AND FIELD REVIEW REQUIREMENTS

(Initial applicable discipline below and cross out and initial only those items not applicable to the project.)

### ARCHITECTURAL

- 1.1 Fire resisting assemblies
- 1.2 ~~Fire separations and their continuity~~
- 1.3 ~~Closures, including tightness and operation~~
- 1.4 Egress systems, including *access to exit* within suites and floor areas
- 1.5 Performance and physical safety features (guardrails, handrails, etc.)
- 1.6 Structural capacity of architectural components, including anchorage and seismic restraint
- 1.7 Sound control
- 1.8 Landscaping, screening and site grading
- 1.9 Provisions for fire fighting access
- 1.10 Access requirements for persons with disabilities
- 1.11 Elevating devices
- 1.12 Functional testing of architecturally related fire emergency systems and devices
- 1.13 Development Permit and conditions therein
- 1.14 Interior signage, including acceptable materials, dimensions and locations
- 1.15 Review of all applicable shop drawings
- 1.16 Interior and exterior finishes
- 1.17 Dampproofing and/or waterproofing of walls and slabs below grade
- 1.18 Roofing and flashings
- 1.19 Wall cladding systems
- 1.20 Condensation control and cavity ventilation
- 1.21 Exterior glazing
- 1.22 Integration of building envelope components
- 1.23 Environmental separation requirements (Part 5)
- 1.24 Building Envelope, Part 10/ASHRAE Requirements



MAR 25 2013

Date

### STRUCTURAL

- 2.1 Structural capacity of structural components of the *building*, including anchorage and seismic restraint
- 2.2 Structural aspects of *deep foundations*
- 2.3 Review of all applicable shop drawings
- 2.4 Structural aspects of unbonded post-tensioned concrete design and construction

### MECHANICAL

- 3.1 HVAC systems and devices, including high *building* requirements where applicable
- 3.2 ~~Fire dampers at required fire separations~~
- 3.3 Continuity of *fire separations* at HVAC penetrations
- 3.4 Functional testing of mechanically related fire emergency systems and devices
- 3.5 Maintenance manuals for mechanical systems
- 3.6 Structural capacity of mechanical components, including anchorage and seismic restraint
- 3.7 Review of all applicable shop drawings
- 3.8 Mechanical Systems, Part 10/ASHRAE Requirements

BRITISH COLUMBIA BUILDING CODE 2012

Schedule B - Continued

Building Permit No.

(for authority having jurisdiction's use)

14423 Blackburn Cres. WR  
Project Address

Fire Suppression Systems

Discipline

PLUMBING

- 4.1 Roof drainage systems
- 4.2 Site and foundation drainage systems
- 4.3 Plumbing systems and devices
- 4.4 Continuity of fire separations at plumbing penetrations
- 4.5 Functional testing of plumbing related fire emergency systems and devices
- 4.6 Maintenance manuals for plumbing systems
- 4.7 Structural capacity of plumbing components, including anchorage and seismic restraint
- 4.8 Review of all applicable shop drawings
- 4.9 Plumbing Systems, Part 10 requirements

FIRE SUPPRESSION SYSTEMS

- 5.1 Suppression system classification for type of occupancy
- 5.2 Design coverage, including concealed or special areas
- 5.3 Compatibility and location of electrical supervision, ancillary alarm and control devices
- 5.4 Evaluation of the capacity of city (municipal) water supply versus system demands and domestic demand, including pumping devices where necessary
- 5.5 Qualification of welder, quality of welds and material
- 5.6 Review of all applicable shop drawings
- 5.7 Acceptance testing for "Contractor's Material and Test-Certificate" as per-NFPA Standards
- 5.8 Maintenance program and manual for suppression systems
- 5.9 Structural capacity of sprinkler components, including anchorage and seismic restraint
- 5.10 For partial systems — confirm sprinklers are installed in all areas where required
- 5.11 Fire Department connections and hydrant locations
- 5.12 Fire hose standpipes
- 5.13 Freeze protection measures for fire suppression systems
- 5.14 Functional testing of fire suppression systems and devices

ELECTRICAL

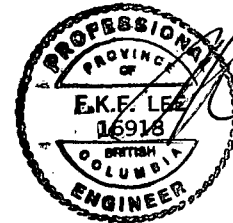
- 6.1 Electrical systems and devices, including high building requirements where applicable
- 6.2 Continuity of fire separations at electrical penetrations
- 6.3 Functional testing of electrical related fire emergency systems and devices
- 6.4 Electrical systems and devices maintenance manuals
- 6.5 Structural capacity of electrical components, including anchorage and seismic restraint
- 6.6 Clearances from buildings of all electrical utility equipment
- 6.7 Fire protection of wiring for emergency systems
- 6.8 Review of all applicable shop drawings
- 6.9 Electrical Systems, Part 10/ASHRAE requirements

GEOTECHNICAL — Temporary

- 7.1 Excavation
- 7.2 Shoring
- 7.3 Underpinning
- 7.4 Temporary construction dewatering

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- 8.1 Bearing capacity of the soil
- 8.2 Geotechnical aspects of deep foundations
- 8.3 Compaction of engineered fill
- 8.4 Structural considerations of soil, including slope stability and seismic loading
- 8.5 Backfill
- 8.6 Permanent dewatering
- 8.7 Permanent underpinning



(Professional's Seal and Signature)

MAR 25 2013

Date

CRP's Initials



THE CORPORATION OF THE  
**CITY OF WHITE ROCK**

15322 BUENA VISTA AVENUE, WHITE ROCK, B.C. V4B 1Y6

DEVELOPMENT SERVICES DEPARTMENT TEL: (604)541-2136 FAX: (604)541-2153

**FORM 'B'**

**PROOF OF PROFESSIONAL LIABILITY INSURANCE**

RE: Address: 14423 Blackburn Cres., W.R.

Building Permit Application No.: #13036

The undersigned hereby gives assurance that:

- a) I have fulfilled my obligation to obtain a subsisting policy of professional liability or errors and omissions insurance as outlined in section 16.3 of **Building Bylaw No. 1782**.
- b) I have enclosed a copy of my certificate of insurance indicating the particulars of such coverage.
- c) I am a registered professional as defined under Section 1.4 of the British Columbia Building Code.
- d) I will notify the Building Official immediately if this insurance coverage is reduced, expired or terminated at any time during construction.

Signed this \_\_\_\_\_ day of MAR 25 2013

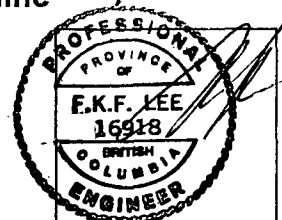
Fred Lee  
Print Name of Registered Professional

[Signature]  
Signature of Registered Professional

Fire Suppression Systems  
Professional's Discipline

Professional's seal

or



Signed this \_\_\_\_\_ day of \_\_\_\_\_

Witness Signature



**Certificate of Insurance**

Vancouver 1600 - 1111 West Georgia St., Vancouver, BC V6E 4G2 Telephone: 604 682 4211 Facsimile: 604 682 3520

**Certificate Holder:** To Whom It May Concern

**Description:** Evidence of Insurance

**Name of Insured:** FKL Engineering Consultants Ltd.

This is to certify that the policies of insurance listed in the attached Certificate have been issued to the insured named above for the policy period indicated, notwithstanding any requirement, term or condition of any contract or other document with respect to which this certificate may be issued or may pertain. The insurance afforded by the policies described herein is subject to all the terms, exclusions and conditions of such policies. Limits shown may have been reduced by paid claims/expenses.

**Schedule of Insurance**

Type of Insurance	Company and Policy Number	Policy Dates	Limit of Liability/Amount
Practice Professional Liability (Claims Made)	Certain Lloyd's Underwriters as arranged by Lloyd & Partners Limited under Contract No. 7066/12 UMR No. B0753PR1200088000  Policy No.: 7066/12-VR1280	Effective: April 19, 2013 ✓	\$ 500,000 Per Claim
		Expiry: April 19, 2014 ✓	\$ 1,000,000 Aggregate Limit
			\$ 2,500 Self Insured Retention (Each and Every Loss)

These statements have been made in good faith and are a summary of the insurance cover in force (which is subject to the full terms and conditions of the policy). We accept no responsibility whatsoever for any inadvertent or negligent act, error or omission on our part in preparing these statements or for any loss, damage or expense thereby occasioned to any recipient of this certificate.

Jardine Lloyd Thompson Canada Inc.

Per: \_\_\_\_\_

Dated: April 17, 2013

**Terms and Conditions**

This certificate is issued for convenience only. All of the terms and conditions of the Policies referred to are contained in the original document which are not modified or amended by this Certificate. With respect to Liability Insurance Coverages, where an Aggregate limit applies, the Certificate Holder is advised that the limit shown may apply to products/completed operations or projects other than shown in this certificate and the limit may be reduced by Claims/Expenses Paid.





## Fire Sprinkler Requirements

Development Services Department  
15322 Buena Vista Ave., White Rock, B.C. V4B 1Y6  
Phone: 604 541 2136 Fax: 604 541 2153  
Website: [www.whiterockcity.ca](http://www.whiterockcity.ca)

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- All piping, fittings, hangers etc. to be installed in conformance with the current addition of NFPA 13D and the BC Building Code.
- Fire Sprinkler **Flow Verification Report** to be submitted by a company certified by the Standards Council of Canada.
- Minimum six (6) spare sprinkler heads reflecting each type installed complete with a wrench, to be kept in a cabinet mounted on the wall by the main valve.
- Fire Sprinkler System to be installed as a flow through system to the most remote water closet.
- The flow through water closet cannot exceed six (4.8) litre flush.
- Flow switch to be interconnected with all local smoke alarms.
- A pressure-reducing valve (such as a watts S-P60/B) must be installed on the flow through water closet.
- Crawl spaces exceeding 5'-11" are considered storage areas and must be fire sprinklered.
- Non-combustible piping must be used where combustible piping cannot be protected.
- If a furnace/Hot water tank appliance is installed in a crawl space, this space then becomes a service space and must be fire sprinklered using non-combustible piping.
- Inspectors Test Drain to be piped over floor drain or exterior of building with orifices equivalent to the smallest sprinkler.
- Fire Sprinkler Engineer to be responsible for the review of piping insulation in unheated areas.

# Sprinkler Heads & General Design Information

## Residential Fire Sprinkler System

F&L Engineering Consultants Ltd.  
(cell) 618-0438, (fax) 435-3181

Project Address : **144 23 Blackburn Cres., White Rock.** Date: **25 March, 2013**  
 Installation Contractor : **Newtech Fire Protection.**

### Manufacturer's Listed Minimum Design Flow & Pressure

Type Selected	Style	Make Model	Temp. K	1@12x12 2@12x12 (gpm@psi)	1@14x14 2@14x14 (gpm@psi)	1@16x16 2@16x16 (gpm@psi)	1@18x18 2@18x18 (gpm@psi)	1@20x20 2@20x20 (gpm@psi)	Sym.	Bsmt Count	Main Count	2nd fl. Count	3rd fl. Count
✓	Pendent	Tyco LFI TY2234	155 4.9	13@7.0	13@7.0	13@7.0	17@12.0	20@16.7	●	6	10		
	Conceal Pendent	Tyco LFI TY3596	155 4.9	13@7.0	13@7.0	13@7.0	17@12.0	20@16.7	●				
	Pendent	Reliable F1/RES/49	155 4.9	13@7.0	13@7.0	13@7.0	17@12.0	20@16.6	●				
	Conceal Pendent	Reliable RFC 49	155 4.9	13@7.0	13@7.0	13@7.0	17@12.0	20@16.7	●				
	Conceal Pendent	Viking VK456	155 4.9	13@7.0	13@7.0	13@7.0	17@12.0	23@22.0	●				
	Pendent	Viking VK468	155 4.9	13@7.0	13@7.0	13@7.0	17@12.0	20@16.7	●				
	Conceal Pendent	Globe GL4906	155 4.9	13@7.0	13@7.0	13@7.0	17@12.0	20@16.7	●				
	Pendent	Victaulic V2740	155 4.9	12@7.8	13@7.0	13@7.0	17@12.0	20@16.7	●				
	Commercial Conc. Pendent	Tyco 3531 Reliable G4A	155 5.6	coverage=148 sq.ft per head, min. flow = 14.8 usgpm@7.0psi max. distance from walls - 7' 6"					○				
	Commercial Pendent	Tyco 3231 Reliable F1FR	155 5.6	coverage=148 sq.ft per head, min. flow = 14.8 usgpm@7.0psi max. distance from walls - 7' 6"					○				

✓	Sidewall	Tyco LFI Ty2334	155 4.4	12@8.2	14@11.1	16@14.5	N/A	N/A	▲		1	16	
	Sidewall	Reliable F1/RES/44	155 4.4	12@7.5	14@10.2	16@13.3	19@18.7		▲				
	Sidewall	Victaulic V2738	155 4.2	14@11.1	14@11.1	17@16.4	N/A	N/A	▲				
	Sidewall	Viking VK450	155 4.2	12@8.2	14@11.1	18@18.4	N/A	N/A	▲				
	Sidewall	Globe GL4231	155 4.2	13@9.6	15@12.8	16@14.5			▲				
	Commercial Sidewall	Tyco 3331 Reliable F1FR	155 5.6	coverage=148 sq.ft per head, min. flow = 14.8 usgpm@7.0psi max. from side walls - 7', max. from opposite wall - 14'					△				
	Sidewall Hi-Temp.	Globe GL Series	200 5.6						▲				
	Pendent Hi-Temp.	Globe GL Series	200 5.6						●	2	2		

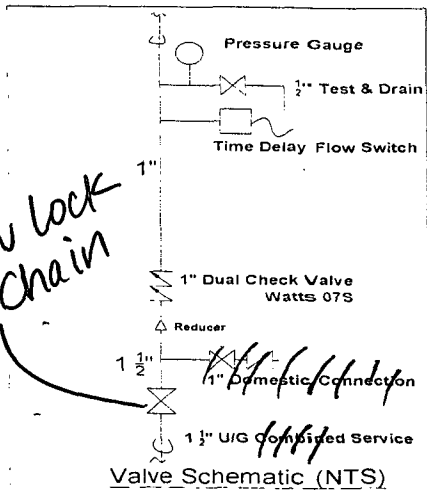
**General Notes:**

- Sprinkler system shall conform to the requirements of NFPA-13D, ~~BC~~ B.C. Building Code, V.B.B.L.2007
- Verify all dimensions on site and coordinate with other trades for location of pipes and sprinklers
- Exposed piping shall be type L copper & concealed piping shall be BlazeMaster protected with minimum 1/2" drywall.
- Unsprinklered washroom shall be max. 55 sq.ft.
- Unsprinklered closets max. 24 sq.ft. and the least dimension less than 3 ft and with drywall finish.
- Unsprinklered crawl space shall be max. 3'-11" high and shall not be used for storage.
- Install all piping so as to be drainable.
- Piping run in outside wall/roof/deck assemblies shall be boxed in against any exposed sides with 2-1/2" R-20 high density insulation and all joints sealed with expansion foams.
- The sprinkler fire water shall be connected to the furthest toilet (flow thru. system), unless otherwise specified.

**2012**

8	13	16	
---	----	----	--

Total Heads 37



General Information: **Epcor, PHD main static 82 psi**

City Water Supply (psi)	Static: <b>70</b>	Residual: <b>61</b>	@ 36 usgpm
Fire Pump	- NA -		
<b>Sprinkler heads Coverage (ft x ft)</b>			
● basmt fl	● main fl	● 2nd fl	● 3rd fl
<b>16x16 / 14x14</b>	<b>16x16 / 14x14</b>	<b>16x16 / 14x14</b>	—
Demand (psi @ usgpm, 2 heads)			(Professional Seal)
<b>55.32 psi @ 33.63 usgpm</b>			

MAR 25 2013

# HYDRAULIC CALCULATIONS

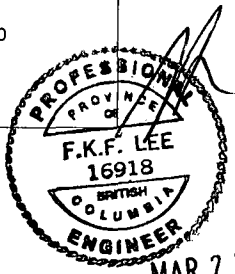
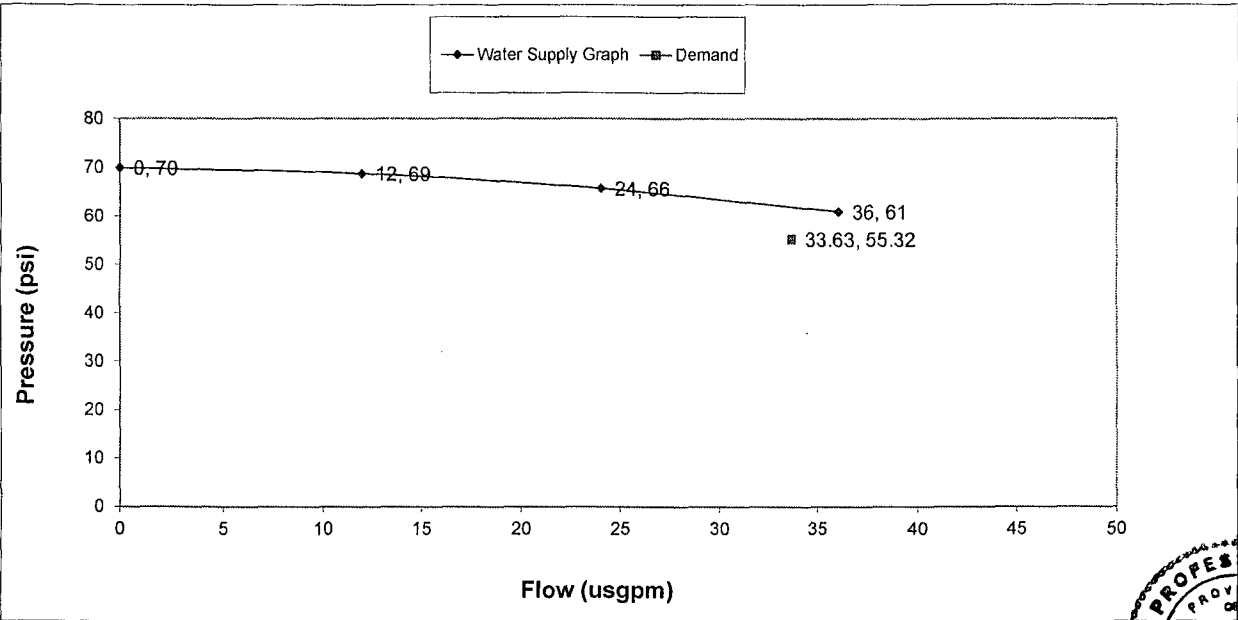
**Address: 14423 Blackburn Cres, White Rock** Date: 25-Mar-13

Make: Rel. F1/Res/44 Type: Sidewall Listed Flow/Pressure: 14.00 usgpm 10.20 psi  
Two Head Flow K = 4.4 Coverage:(ftxft): 14x14

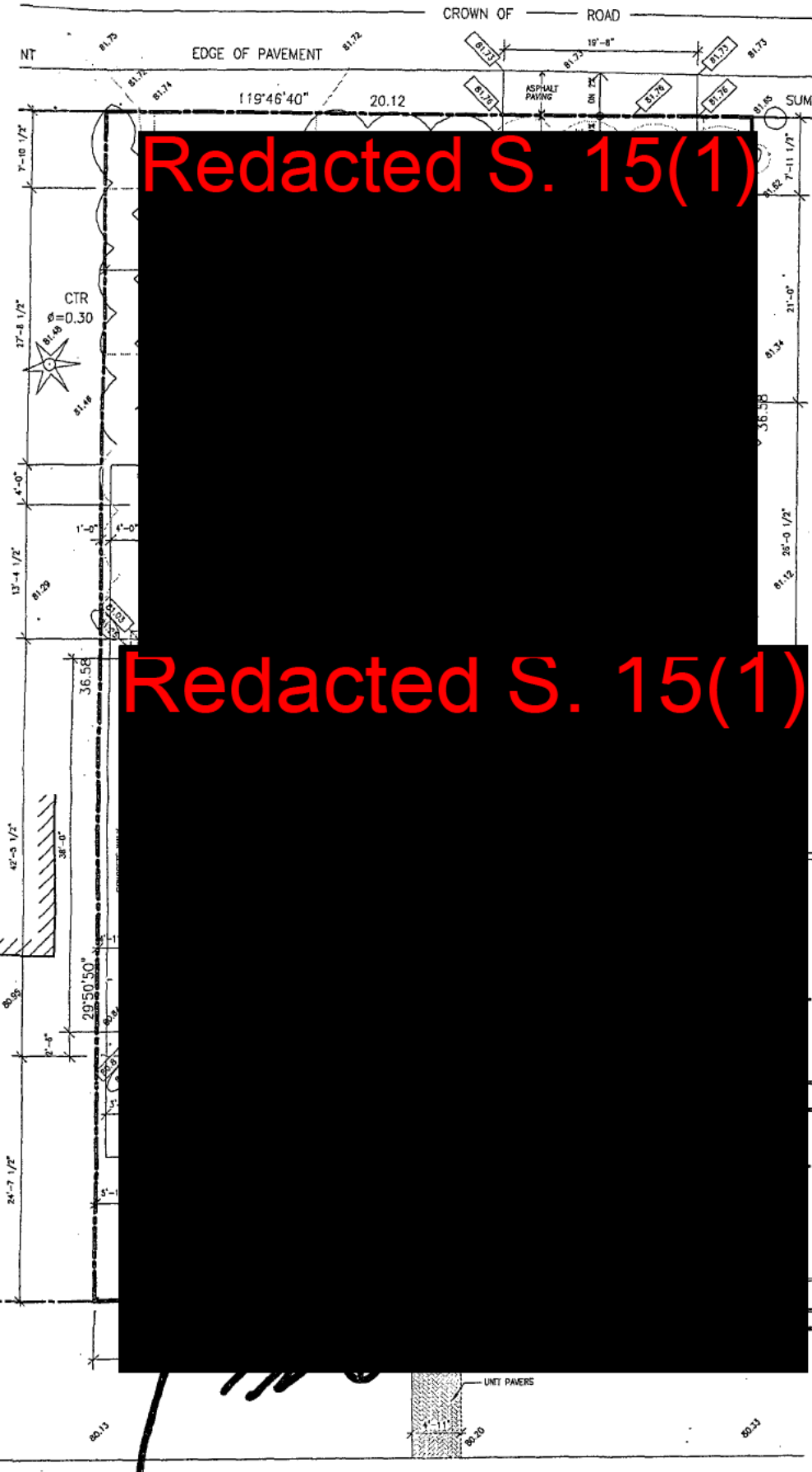
Calculations					Hazen Williams C=150										Total (psi)		
To	From				Domestic (usgpm)	Piping		Fittings				Pressure Loss (psi)				10.20	
Ref. Pt.	Elev (ft)	Ref. Pt.	Elev (ft)	Flow (usgpm)		Pipe ID (inch)	Pipe Mat.	Elbow 90	Tee Bran.	Ball Valve	Pipe	Total eq. ft	Elev.	Fric. Ref.	Fric.		dual checks
6	26	4	13	14.00		1.109	cpvc	2	1	0	31	48	5.65		1.63		17.48
5	26	4	13	14.63		1.109	cpvc	1	1	0	11	21	0.00	0.77			17.48
4	13	3	6	28.63		1.109	cpvc	5	5	0	72	132	3.04		16.84		37.36
3	6	2	2	28.63	5.0	1.025	copper L	2	0	0	7	12	1.74		2.25	8.0	49.35
2	2	1	0	33.63		1.263	polytube	0	1	1	50	56	0.87		5.11		55.32
					33.63								11.30		25.82		55.32

## System Design Summary

Ref. Pt.	K	Elev. (ft)	Flow (usgpm)	Pressure (psi)	Coverage (ft x ft)
6	4.4	26	14.00	10.20	14x14
5	4.4	26	14.63	11.06	14x14
The sprinkler system flow is			28.63 usgpm		
The total system flow is			33.63 usgpm	at 55.32 psi	
Static Pressure			70 psi		
Residual Pressure			61 psi	at 36.00 usgpm	
Available Pressure			62.07 psi	at 33.63 usgpm	
Operating Pressure			55.32 psi	at 33.63 usgpm	
Pressure Remaining			6.74 psi		



MAR 25 2013



**Redacted S. 15(1)**

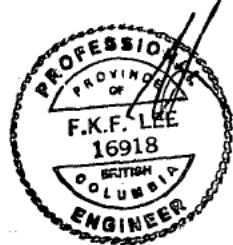
**Redacted S. 15(1)**

**Redacted S. 15(1)**

**Fire Sprinkler Flow Verification Report to be submitted at insulation stage**

**Minimum six (6) spare sprinkler heads reflecting each type installed and a wrench to be kept in a cabinet by the main valve**

1-1/2" Polytube  
Municipal Series 160  
U/G Combined Services



MAR 25 2013

Site Plan ( scale : 1/16"=1'-0" )

Section ( scale : 1/8"=1'-0" )

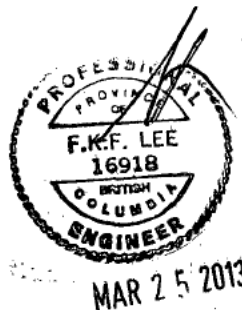
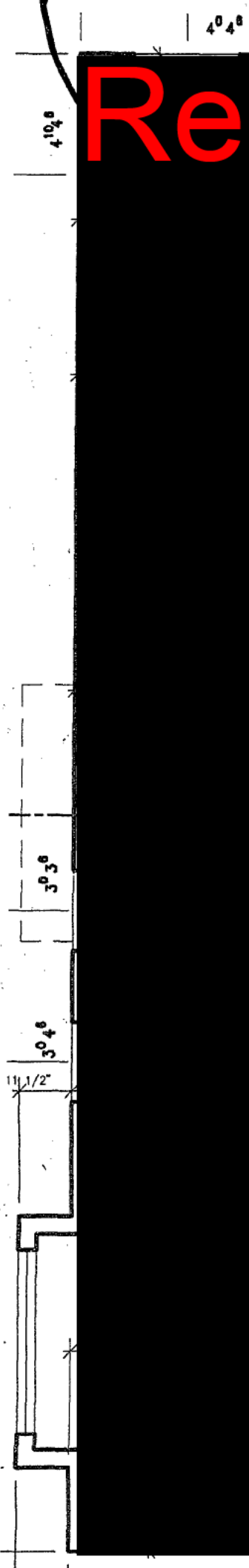
(Address : 14423 Blackburn Cres., White Rock)

Drawing : Fire Protection  
By FKL Engineering Consultants Ltd.  
Cell: 604-618-0438  
Fax: 604-435-3181  
Fire Sprinkler Installation Contractor:  
NewTech Fire Protection, 778-999-7854

Flow Thru. System,  
Fire Water Supply to  
the Most Remote WC  
with a PRV



Redacted S. 15(1)



All Piping 1"  
Unless Noted Otherwise

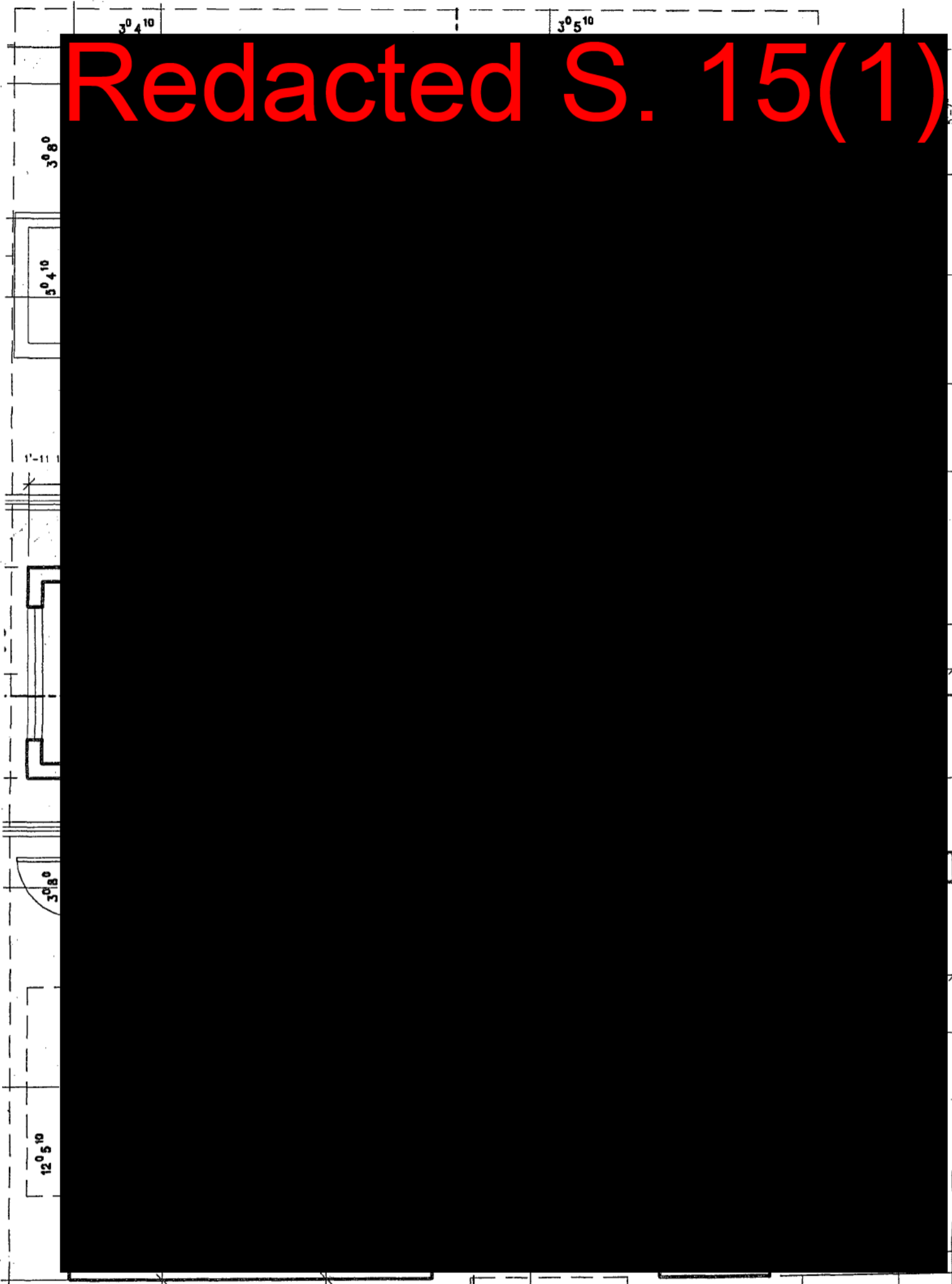
2nd Floor (scale : 3/16"=1'-0")  
(Address : 14423 Blackburn Cres., White Rock)

- Tyco 2234, Pendent, 155F, K=4.9, Cov. 16'x16'
- ▲ Tyco 2334, Sidewall, 155F, K=4.4, Cov. 14'x14'

Drawing : Fire Protection  
 By FKL Engineering Consultants Ltd.  
 Cell: 604-618-0438  
 Fax: 604-435-3181

Fire Sprinkler Installation Contractor:  
 NewTech Fire Protection, 778-999-7854

**Redacted S. 15(1)**



All Piping 1"  
Unless Noted Otherwise

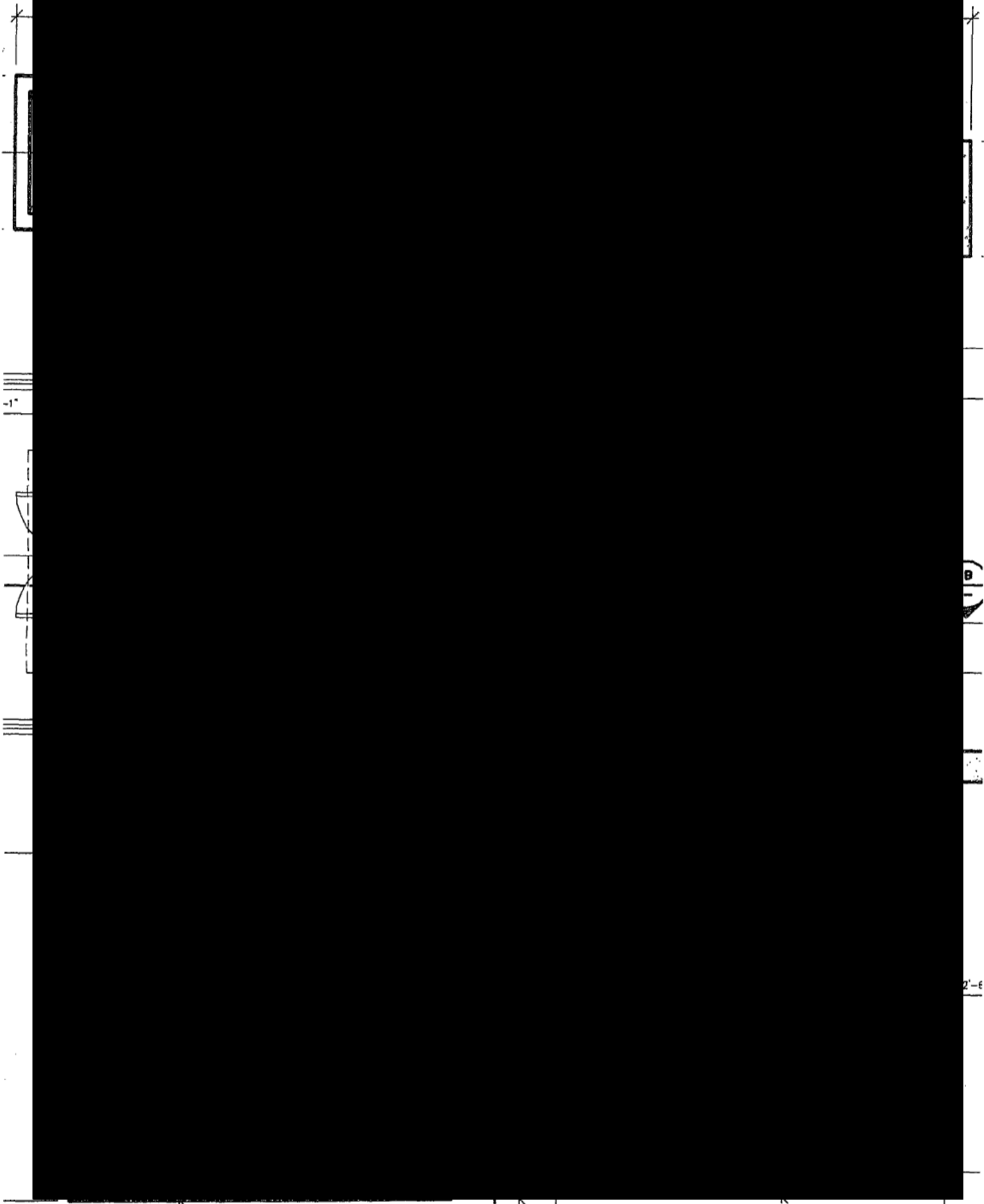


Main Floor (scale : 3/16"=1'-0")  
(Address : 14423 Blackburn Cres., White Rock)

- Tyco 2234, Pendent, 155F, K=4.9, Cov. 16'x16'

Drawing : Fire Protection  
By FKL Engineering Consultants Ltd.  
Cell: 604-618-0438  
Fax: 604-435-3181  
Fire Sprinkler Installation Contractor:  
NewTech Fire Protection, 778-999-7854

# Redacted S. 15(1)



*[Handwritten signature]*  
①



MAR 25 2013

All Piping 1"  
Unless Noted Otherwise



Basement Floor (scale : 3/16"=1'-0")  
(Address : 14423 Blackburn Cres., White Rock)

● Tyco 2234, Pendent, 155F, K=4.9, Cov. 16'x16'

Drawing : Fire Protection
By FKL Engineering Consultants Ltd.
Cell: 604-618-0438
Fax: 604-435-3181
Fire Sprinkler Installation Contractor: NewTech Fire Protection, 778-999-7854



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Date: Issued For:

A A DETAIL NUMBER  
B B LOCATION SHEET  
C C DETAIL SHEET

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Project: 14423 Blackburn Cres. White Rock, B.C.

14423 Blackburn Cres. White Rock, B.C.

Drawing Title: SITE PLAN

Date:

Scale:

Drawn By:

Checked By:

Project No.:

Drawing No.:

Redacted S. 15(1)

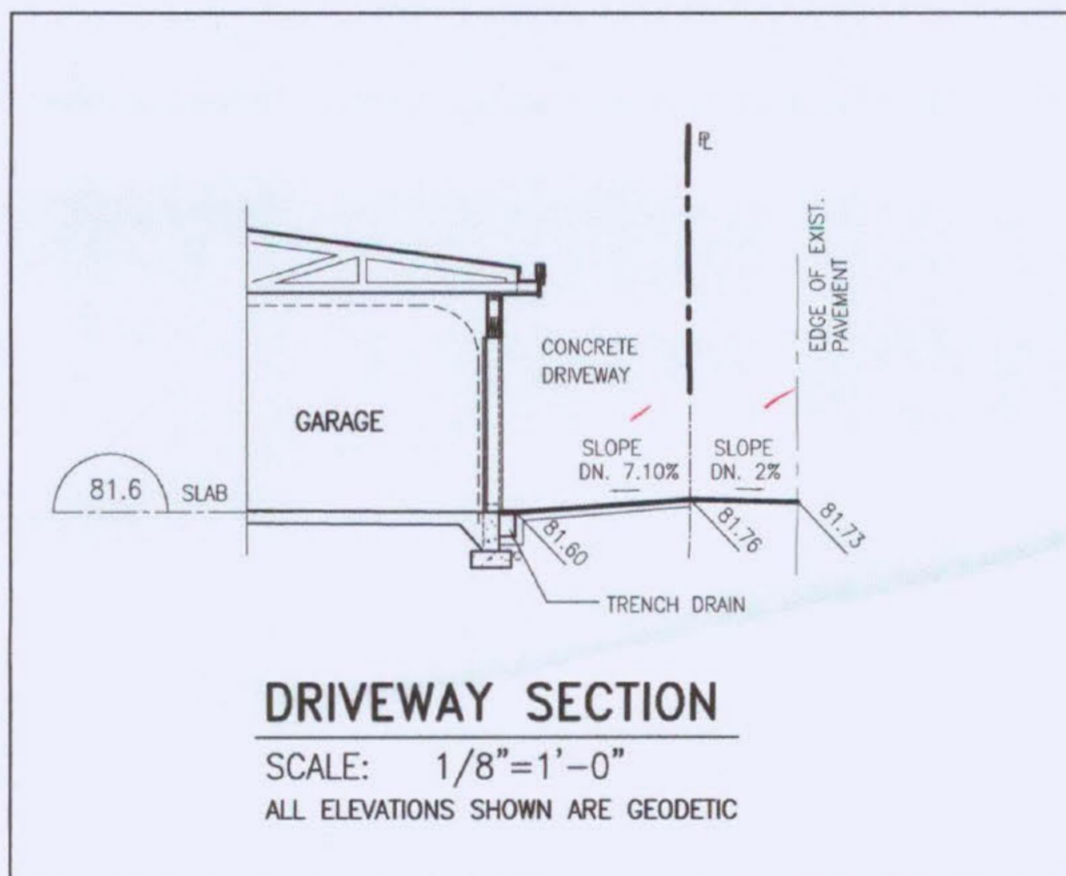
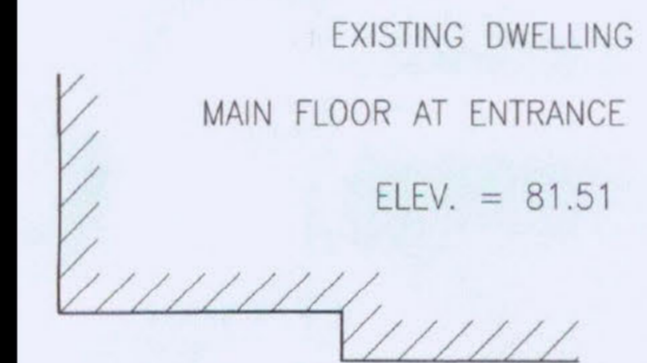


WHITE  
Confirmed

7.5m Dwelling setback line.

Veranda Connection not permitted (not approved) As shown

19  
Soffits project to less than 1.2 m property line, they shall have no need conform to protection as sentence 9.10.14.5. (11).



BUILDING INFORMATION DATA  
CIVIC ADDRESS: 14423 - BLACKBURN CRESCENT, WHITE ROCK, B.C.  
LEGAL DESCRIPTION: PLAN OF LOT 18 SECTION 10 TOWNSHIP 1 NWD PLAN 13899  
PID : 009-864-512  
ZONE: RS-1  
DESIGN ANALYSIS:  
LOT AREA: 7920 SQ.FT.  
FAR-PERMITTED: 0.50: 3960 SQ.FT.  
PROPOSED: 0.50: 3957 SQ.FT.

SITE COVERAGE:  
PERMITTED: 45% 3564 SQ.FT.  
PROPOSED: 35% 2765 SQ.FT.

GARAGE PROPOSED: 441 SQ.FT.

CITY OF WHITE ROCK DEVELOPMENT SERVICES

MAR 27 2013

RECEIVED

GENERAL NOTES

- 1. ALL CONSTRUCTIONS SHALL CONFORM TO THE BC BUILDING CODE 2012 AND WHITE ROCK BY-LAWS.
- 2. ELECTRICAL WORK SHALL CONFORM TO CANADIAN ELECTRICAL CODES
- 3. PLUMBING WORK SHALL CONFORM TO B.C. PLUMBING CODE
- 4. CONTRACTOR SHOULD CHECK AND COORDINATE ALL DIMENSIONS PRIOR TO PROCEEDING
- 5. ALL CONCRETE FOUNDATION WALL TO BE DAMPROOFED W/2 COATS OF ASPHALT DAMPROOFING
- 6. CONCRETE USED SHALL HAVE A MIN. COMPRESSIVE STRENGTH OF 3600 PSI @ 28 DAYS (25 MPa). FOR GARAGE SLAB - 32 MPa
- 7. ALL WOOD PLATES ON CONCRETE FOUNDATION TO BE DAMPROOFED W/#45 FELT
- 8. LINTEL BEAMS TO BE 2-2x10 UNLESS SPECIFIED OTHERWISE
- 9. DOUBLE JOISTS UNDER ALL PARTITIONS
- 10. ALL WINDOWS TO BE DOUBLE GLAZED W 1/2" AIR SPACE BETWEEN GLAZING
- 11. ALL CHIMNEYS, VENTS AND FLUES, AS WELL AS ANY ROOF PUNCTURE, TO BE PROPERLY FLASHED
- 12. ALL EXTERIOR ELECTRICAL OUTLETS BE PROVIDED W/ SPRING LOAD W.P. CAPS
- 13. NO CABLES TO BE ROUTED OVER ANY DECK AREA
- 14. ROOF VENT TO BE PROVIDED AT 1 SQ.FT. PER 300 SQ.FT. OF INSULATED ROOF AREA
- 15. ALL GRADES SHOWN ARE EXISTING AND FINISH GRADE
- 16. SMOKE ALARMS TO BE PROVIDED AS SHOWN ON PLANS

**\* REVIEW ATTACHED SHEETS \***  
- TREE PROTECTION GUIDELINES  
- STORM DRAINAGE SYSTEM REQUIREMENTS  
- SUB TRADES LIST  
- STORM & SANITARY SEWER CONNECTION SHEETS  
- MECHANICAL VENTILATION SHEETS  
- INSPECTIONS REQUIRED  
- WORKSAFEBCC INSPECTION SERVICE POLICY

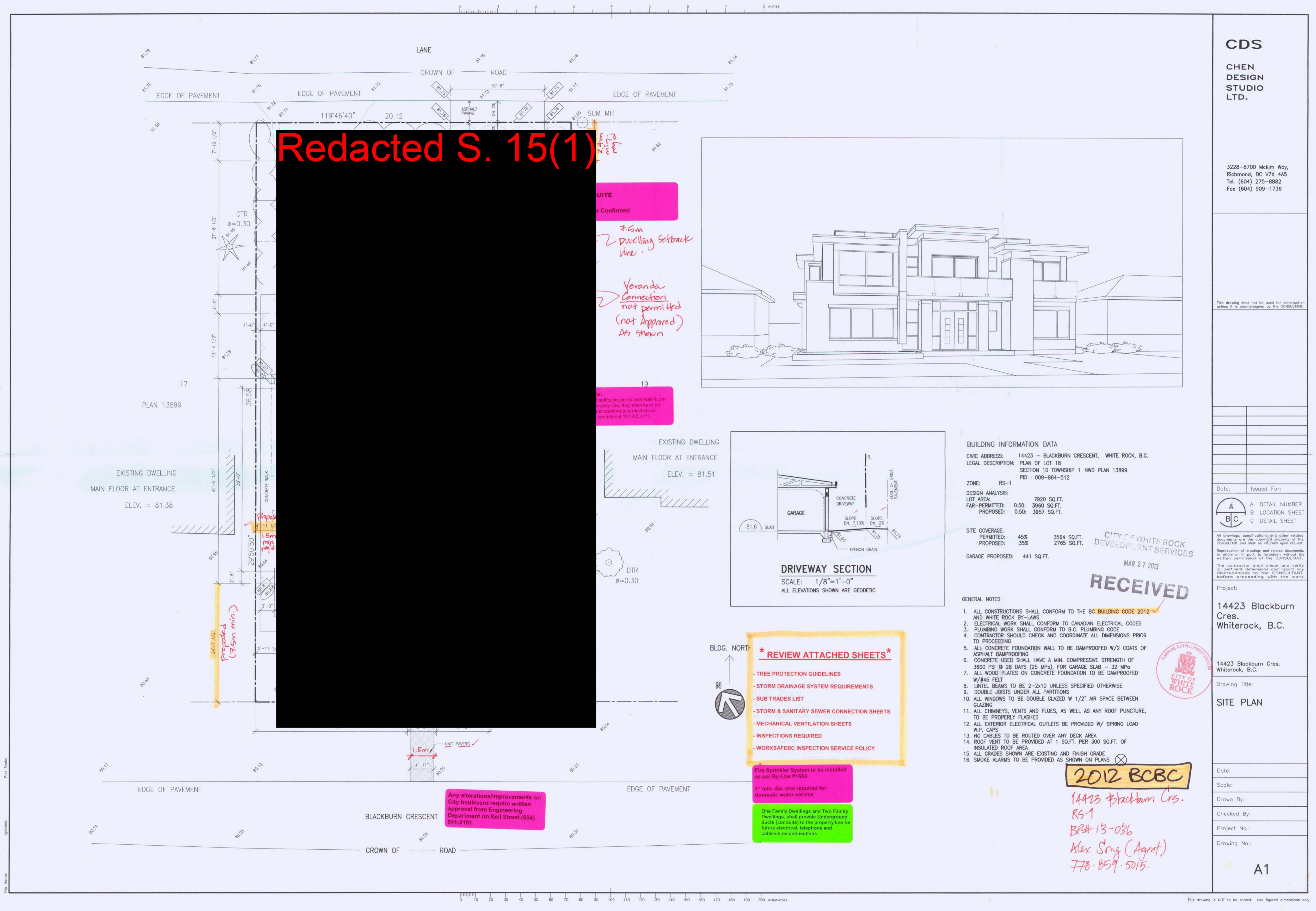
Fire Sprinkler System to be installed as per By-Law #1683  
1" min. dia. size required for domestic water service

One Family Dwellings and Two Family Dwellings shall provide Underground ducts (conduits) to the property line for future electrical, telephone and cablevision connections

Any alterations/improvements on City boulevard require written approval from Engineering Department on Keil Street (604) 541-2181

2012 BCBC

14423 Blackburn Cres.  
RS-1  
BR# 13-036  
Alex Song (Agent)  
778-859-5015.



File Name: Updated: Plot Size:



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C	C	DETAIL SHEET

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Project:

14423 Blackburn Cres.  
Whiterock, B.C.

14423 Blackburn Cres.  
Whiterock, B.C.

Drawing Title:

FLOOR PLANS

Date:

Scale:

Drawn By:

Checked By:

Project No.:

Drawing No.:

A2

Redacted S. 15(1)

Redacted S. 15(1)

NO SUITE  
Owner Confirmed

Window Opening into a Window Wells to comply to the B.C. Building Code. All window wells require fall protection.

Carbon Monoxide Detectors:  
Hardwired CO2 alarms are required on all floor levels and in rooms where fuel powered appliances are located.  
3" CURB REQUIRED UNDERSIDE ALL DOORSILLS TO FINISHED SURFACES

All Handrails and Guardrails to comply with the BC Building Code

Seismic restraint required on hot water tanks

FOOTING SIZE = 20"X20", PROVIDE 3-15M LONGITUDINAL @ 3" CLEAR COVER FROM BOTTOM.  
FOUNDATION WALL = 8" THICK, PROVIDE 15M @ 16" O.C. EACH WAY C/W 1.5" CLEAR COVER FROM INSIDE FACE OF WALL.  
F1 = 36"X36"X10" CONCRETE PAD FOOTING, 3-15M EACH WAY AT 3" CLEAR COVER FROM BOTTOM.  
DESIGNED FOR 1500#f BEARING CAPACITY OF SOIL.  
REFER TO DRAWING "S1" FOR TYPICAL STRUCTURAL DETAILS.  
F2 = 48"X48"X10" CONCRETE PAD FOOTING, 4-15M EACH WAY AT 3" CLEAR COVER FROM BOTTOM.

BASEMENT FLOOR PLAN

SCALE: 1/8"=1'-0"

961 S.F.

FOOTING SIZE = 20"X20", PROVIDE 3-15M LONGITUDINAL @ 3" CLEAR COVER FROM BOTTOM.  
FOUNDATION WALL = 8" THICK, PROVIDE 15M @ 16" O.C. EACH WAY C/W 1.5" CLEAR COVER FROM INSIDE FACE OF WALL.  
F1 = 36"X36"X10" CONCRETE PAD FOOTING, 3-15M EACH WAY AT 3" CLEAR COVER FROM BOTTOM.  
DESIGNED FOR 1500#f BEARING CAPACITY OF SOIL.  
REFER TO DRAWING "S1" FOR TYPICAL STRUCTURAL DETAILS.

F2 = 48"X48"X10" CONCRETE PAD FOOTING, 4-15M EACH WAY AT 3" CLEAR COVER FROM BOTTOM.

NOTE: DIMENSION FOR EXTERIOR WALLS ARE MEASURED FROM EXTERIOR WALL FINISH.

GROUND FLOOR PLAN

SCALE: 1/8"=1'-0"

2038 S.F.

FSR: [REDACTED] S.F.



File Name: Part 3000



CDS

CHEN  
DESIGN  
STUDIO  
LTD.

3228-8700 McKim Way,  
Richmond, BC V7X 4A5  
Tel. (604) 275-8882  
Fax (604) 909-1736

This drawing shall not be used for construction unless it is countersigned by the CONSULTANT.



Date:	Issued For:						
<table border="1"> <tr> <td>A</td> <td>A DETAIL NUMBER</td> </tr> <tr> <td>B</td> <td>B LOCATION SHEET</td> </tr> <tr> <td>C</td> <td>C DETAIL SHEET</td> </tr> </table>		A	A DETAIL NUMBER	B	B LOCATION SHEET	C	C DETAIL SHEET
A	A DETAIL NUMBER						
B	B LOCATION SHEET						
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Project:  
**14423 Blackburn Cres.  
Whiterock, B.C.**

14423 Blackburn Cres.  
Whiterock, B.C.  
Drawing Title:  
**FLOOR PLANS**

Date:

Scale:

Drawn By:

Checked By:

Project No.:

Drawing No.:

A3

Redacted S. 15(1)

Redacted S. 15(1)

Seats not permitted in "on-site" built showers

All decking surface material to be an approved roof membrane

Roof decks require 2% slope and 2x4 cross-perkins c/w overhangs for ventilation

Handrails and Guardrails to comply with the BC Building Code

CURB REQUIRED UNDERSIDE OF ALL DOORSILLS TO FINISHED SURFACES

Carbon Monoxide Detectors:  
Wired CO2 alarms are required on all floor levels and in rooms where fuel powered appliances are used

5/8" THICK ROOF SHEATHING REQUIRED

NOTE:  
DIMENSION FOR EXTERIOR WALLS ARE MEASURED FROM EXTERIOR WALL FINISH.

SECOND FLOOR PLAN

SCALE: 1/8"=1'-0"

1919 S.F. (contains 96SF)

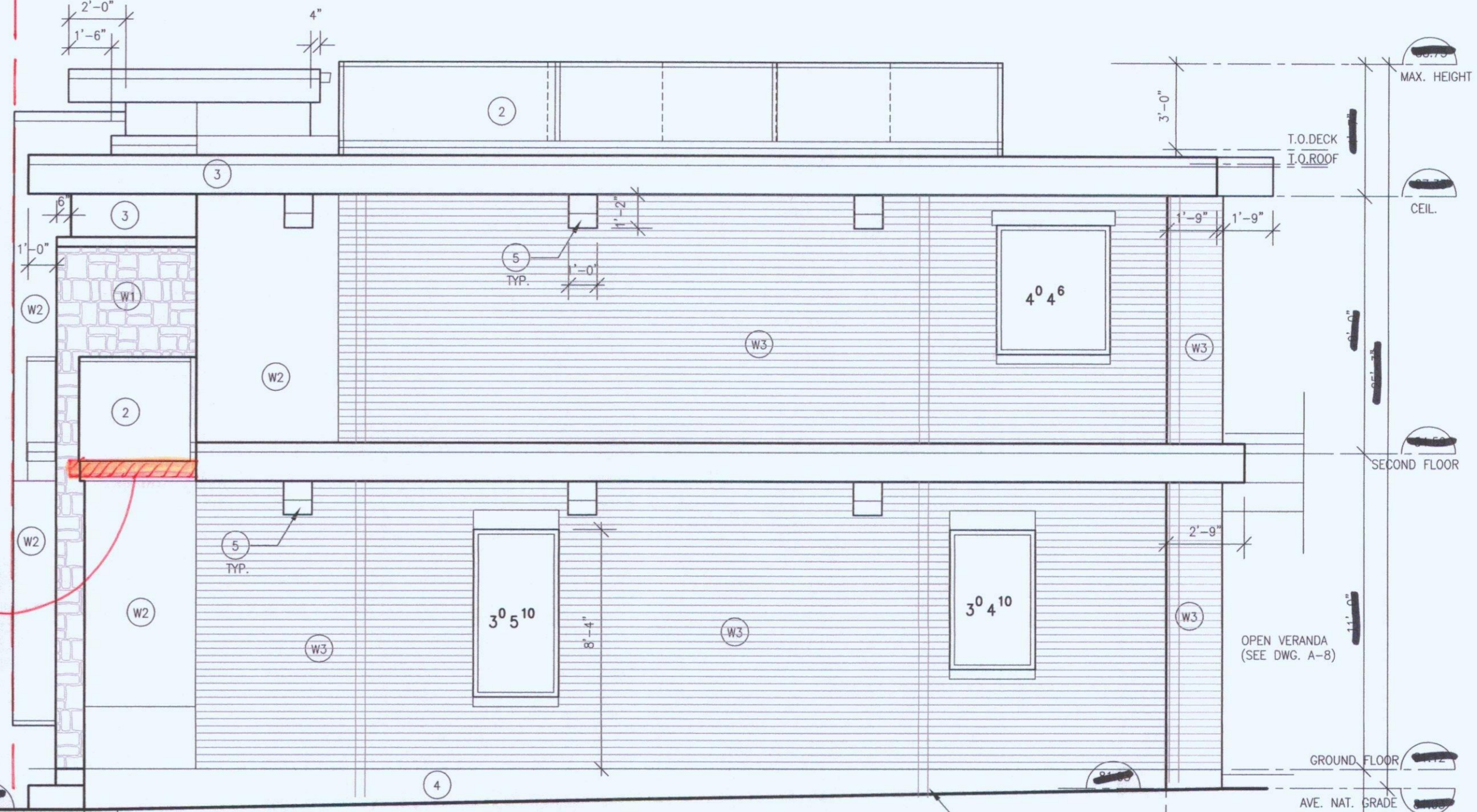
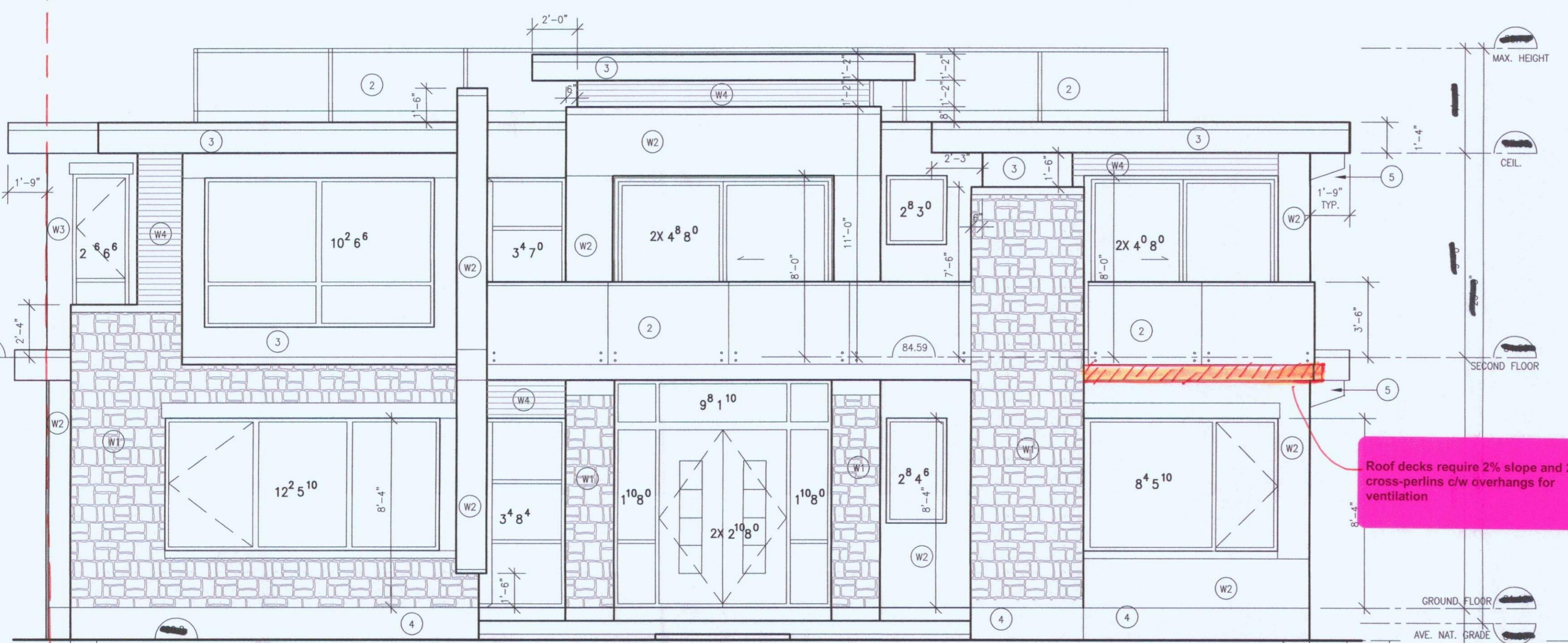
ROOF PLAN

SCALE: 1/8"=1'-0"



MAY 23 2013





*2.15m (min. req'd) sideyard setback line*

*7.5m (min. req'd) front setback line*

- \* ROOF NOTES \***
- 3<sup>rd</sup> party roofing consultant to approve the roof membrane installation
  - Min. 3" square overflow scupper required
  - All roof drains to be min. 3" diameter in size
  - Roof ventilation required c/w 2"x4" cross-perfins
  - Min. (4) four vertical roof vents down the centerline of roof
  - Vaulted ceilings require 2"x4" cross-perfins for ventilation c/w R-28 high density insulation

**SOUTH ELEVATION**  
SCALE: 1/8"=1'-0"

**EAST ELEVATION**  
SCALE: 1/8"=1'-0"

All decking surface material to be an approved roof membrane

**Post to Beam:**  
All post to beam connections require lateral restraint

AIR CONDITIONING/CONDENSING UNITS NOT ALLOWED IN SIDE YARD SETBACK

All Handrails and Guardrails to comply with the BC Building Code

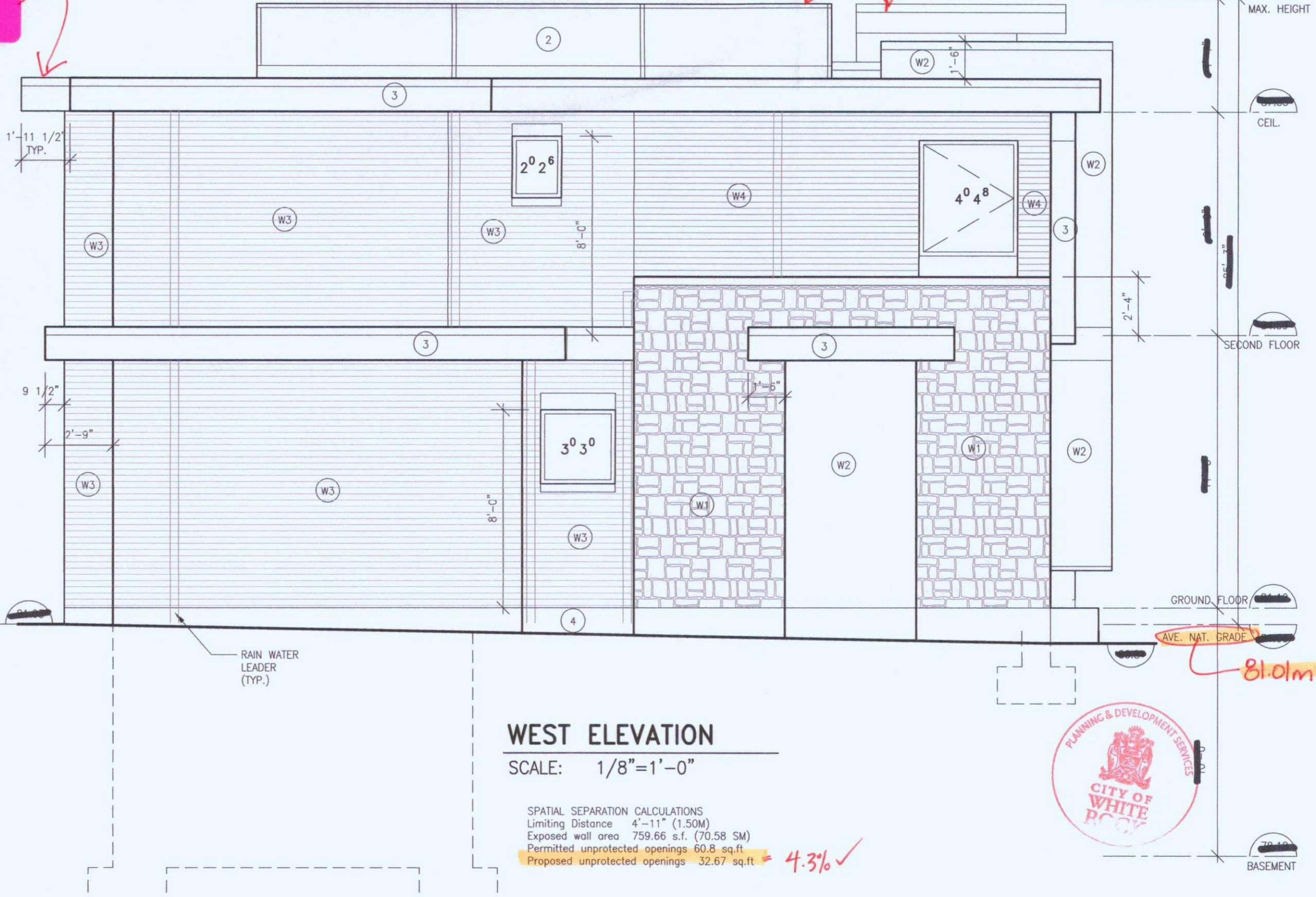
NOTE: Concrete against wood not permitted on any area of this residence. Maintain 8" clearance between top of sidewalks, etc. and exterior finishes

*All glass guardrails require top edge protection*

**Roof Soffits:**  
Where roof soffits project to less than 1.2 m from the property line, they shall have no openings and conform to protection as required in sentence 9.10.14.5. (11)

**SPATIAL SEPARATION CALCULATIONS**  
Limiting Distance 4'-11" (1.50M)  
Exposed wall area 720.88 sq.ft. (67.5M)  
Permitted unprotected openings 57.63 sq.ft.  
Proposed unprotected openings 50 sq.ft. = 69% ✓

*Max. Perm. ht. Ev. = 88.71m*



Window Opening into a Window Wells to comply to the B.C. Building Code. All window wells require fall protection.

**NORTH ELEVATION**  
SCALE: 1/8"=1'-0"

**WEST ELEVATION**  
SCALE: 1/8"=1'-0"

**SPATIAL SEPARATION CALCULATIONS**  
Limiting Distance 4'-11" (1.50M)  
Exposed wall area 759.66 sq.ft. (70.58 M)  
Permitted unprotected openings 60.8 sq.ft.  
Proposed unprotected openings 32.67 sq.ft. = 43% ✓



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Project:  
**14423 Blackburn Cres. Whiterock, B.C.**

14423 Blackburn Cres. Whiterock, B.C.

Drawing Title:  
**ELEVATIONS**

Date:  
Scale:  
Drawn By:  
Checked By:  
Project No.:  
Drawing No.:



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Whiterock, B.C.

14423 Blackburn Cres.  
Whiterock, B.C.

Drawing Title:

SECTIONS &  
CONSTRUCTION  
NOTES

Date:

Scale:

Drawn By:

Checked By:

Project No.:

Drawing No.:

A5

CONSTRUCTION NOTES:

ROOF:

R1. WALKING DECK MEMBRANE ON  
2 PLY TORCH-ON WATERPROOFING MEMBRANE ON  
5/4" PLYWOOD SHEATHING SLOPED TO DRAIN ON  
2x4 SLEEPERS ON EDGE (CUT TO SLOPE AT 1/4" IN 1'-0")  
ON WOOD JOISTS AT 16" (SEE STRUCT.). W/  
CROSS BRIDGING AT 7'-0" MAX. W/  
R-28 BATT INSULATION ON  
6 MIL POLY VAPOUR BARRIER  
1/2" G.W.B.(PAINT FINISH)

R2. 5 PLY TAR & GRAVEL BUILT-UP ROOF ON  
5/8" T & G PLYWOOD SHEATHING ON  
2x4 SLEEPERS ON EDGE (CUT TO SLOPE AT 1/4" IN 1'-0")  
ON 2x12 WOOD JOISTS AT 16" O.C. W/  
CROSS BRIDGING AT 7'-0" MAX. W/  
R-28 BATT INSULATION ON  
6 MIL POLY VAPOUR BARRIER  
1/2" G.W.B.(PAINT FINISH)

R3. METAL ROOF ON  
NO. 15 PERFORATED ASPHALT SATURATED FELT ON  
1/2" T & G PLYWOOD SHEATHING  
ROOF TRUSSES @ 24" O.C. (PREFABRICATED) OR ON  
RAFTERS @ 16" O.C. W/  
MIN. R-40 BATT INSULATION  
(MIN. R-28 VENTED 1/150 FOR VAULTED ROOFS)  
6 MIL POLY VAPOUR BARRIER  
1/2" G.W.B.

INTERIOR:

W5 2x4 WOOD STUDS @ 16" O.C.  
(@12" O.C. IF IN BASEMENT) W/  
1/2" G.W.B. BOTH SIDES

FOUNDATION WALL:

W6 (8" ABOVE FIN. GRADE)  
5/8" TYPE "X" G.W.B  
6 MIL POLY VAPOUR BARRIER (WARM SIDE) ON  
2X6 WOOD STUDS AT 16" O.C. W/  
R-22 HIGH DENSITY F.F. BATT INSULATION  
1/2" AIR SPACE  
8" CONC. FOUNDATION WALL  
W/ DAMPROOFING AT EXTERIOR FACE  
PARGE ALL EXPOSED CONCRETE

W7 5/8" TYPE "X" G.W.B  
6 MIL POLY VAPOUR BARRIER (WARM SIDE) ON  
2X6 WOOD STUDS AT 16" O.C. W/  
R-22 HIGH DENSITY F.F. BATT INSULATION  
1/2" AIR SPACE  
8" CONC. FOUNDATION WALL W/  
2 COATS ASPHALT DAM PROOFING BOTH SIDES  
WATERPROOF MEMBRANE AND DRAINAGE MAT  
1.5" REGID INSULATION  
1/2" PROTECTION BOARD

W8 (AT ACCESS TO BASEMENT...)  
5/8" TYPE "X" G.W.B  
6 MIL POLY VAPOUR BARRIER (WARM SIDE) ON  
2X6 WOOD STUDS AT 16" O.C. W/  
R-22 HIGH DENSITY F.F. BATT INSULATION  
1/2" AIR SPACE  
8" CONC. FOUNDATION WALL

EXTERIOR WALL:

W1 FACE STONE (OR CULTURE STONE)  
(INSTALLATION METHOD PER MANUFACTURER'S SPEC.)  
PRESSURE-TREATED 1/2" X 2" PLYWOOD VERTICAL STRAPPING  
(OVER STUDS BEHIND) WITH RUST RESISTANT FASTENERS,  
SPACING TO CORRESPOND WITH STUD SPACING.  
2 LAYERS 30 MINUTE BUILDING PAPER, INSTALLED IN SHINGLE FASHION  
1/2" PLYWOOD EXTERIOR SHEATHING (STAGGERED-LAP),  
2X6 WOOD STUDS AT 16" O.C. W/  
R-22 BATT INSULATION ON  
6 MIL POLY VAPOUR BARRIER (WARM SIDE) ON  
5/8" TYPE "X" G.W.B

W2 PREFINISHED INTERLOCKING METAL PANEL, RECTANGLE PATTERN  
INSTALLATION PER MANUFACTURER'S SPECIFICATION.  
PRESSURE-TREATED 1/2" X 2" PLYWOOD VERTICAL STRAPPING  
(OVER STUDS BEHIND) WITH RUST RESISTANT FASTENERS,  
SPACING TO CORRESPOND WITH STUD SPACING.  
2 LAYERS 30 MINUTE BUILDING PAPER, INSTALLED IN SHINGLE FASHION  
1/2" PLYWOOD EXTERIOR SHEATHING (STAGGERED-LAP),  
2X6 WOOD STUDS AT 16" O.C. W/  
R-22 BATT INSULATION ON  
6 MIL POLY VAPOUR BARRIER (WARM SIDE) ON  
1/2" G.W.B

W3 HARDIE SIDING ON  
PRESSURE-TREATED 1/2" X 2" PLYWOOD VERTICAL STRAPPING  
(OVER STUDS BEHIND) WITH RUST RESISTANT FASTENERS,  
SPACING TO CORRESPOND WITH STUD SPACING.  
2 LAYERS 30 MINUTE BUILDING PAPER, INSTALLED IN SHINGLE FASHION  
1/2" PLYWOOD EXTERIOR SHEATHING (STAGGERED-LAP),  
2X6 WOOD STUDS AT 16" O.C. W/  
R-22 BATT INSULATION ON  
6 MIL POLY VAPOUR BARRIER (WARM SIDE) ON  
1/2" G.W.B

W4 WOOD SIDING ON  
PRESSURE-TREATED 1/2" X 2" PLYWOOD VERTICAL STRAPPING  
(OVER STUDS BEHIND) WITH RUST RESISTANT FASTENERS,  
SPACING TO CORRESPOND WITH STUD SPACING.  
2 LAYERS 30 MINUTE BUILDING PAPER, INSTALLED IN SHINGLE FASHION  
1/2" PLYWOOD EXTERIOR SHEATHING (STAGGERED-LAP),  
2X6 WOOD STUDS AT 16" O.C. W/  
R-22 BATT INSULATION ON  
6 MIL POLY VAPOUR BARRIER (WARM SIDE) ON  
1/2" G.W.B

FLOOR:

F1 FINISHED FLOOR (PER OWNER'S FINISH SCHEDULES), ON  
1 1/2" 25 MPa CONCRETE TOPPING, C/W POLYPROPYLENE FIBRE, ON  
5/8" T & G PLYWOOD SUBFLOOR, GLUED/NAILED ON  
WOOD JOISTS (SEE STRUCT.). W/  
CROSS-BRIDGING AT 7'-0" MAX. ON  
1/2" G.W.B.

F2 4" CONC. SLAB ON  
6 MILPOLY V.B. ON  
R12 (UNDER ENTIRE SLAB)  
6" COMPACTED SAND FILL

PERIMETER DRAIN:

P1 6" GRAVEL (DRAIN ROCK)  
ON 4" DIAM. DRAIN TILES  
AROUND ALL BUILDINGS

CEDAR WOOD FOR ALL SOFFIT  
DOORS ON MAIN FLOOR ARE ALL 8'-0" HIGH.



Redacted S. 15(1)

Redacted S. 15(1)

High density f.f.

\* Snylights/railings not permitted to encroach H.P.H \*

Max. Perm. ht. E.L. 88.71m

1 CROSS SECTION 'A'-A'  
SCALE: 1/4"=1'-0"

2 CROSS SECTION 'A'-A'  
SCALE: 1/4"=1'-0"

3 A7

4 A7



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Project:

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**Whiterock, B.C.**

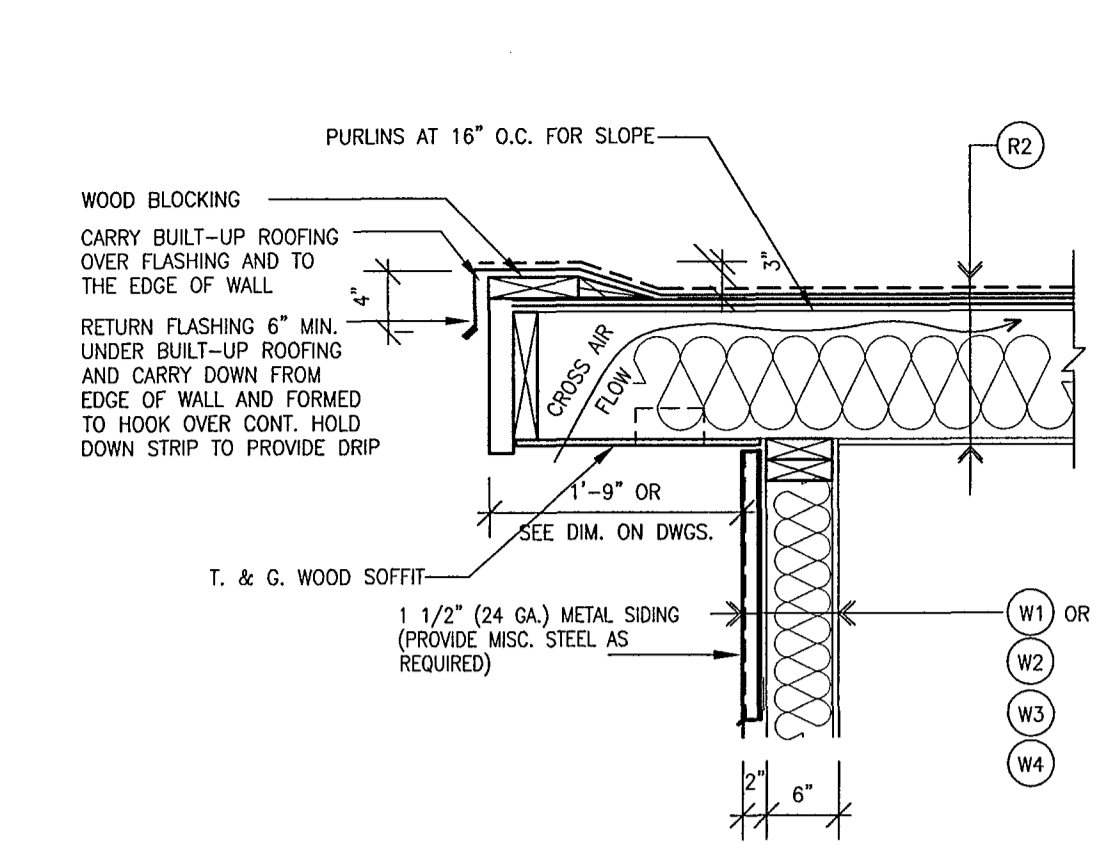
14423 Blackburn Cres.  
 Whiterock, B.C.

Drawing Title:

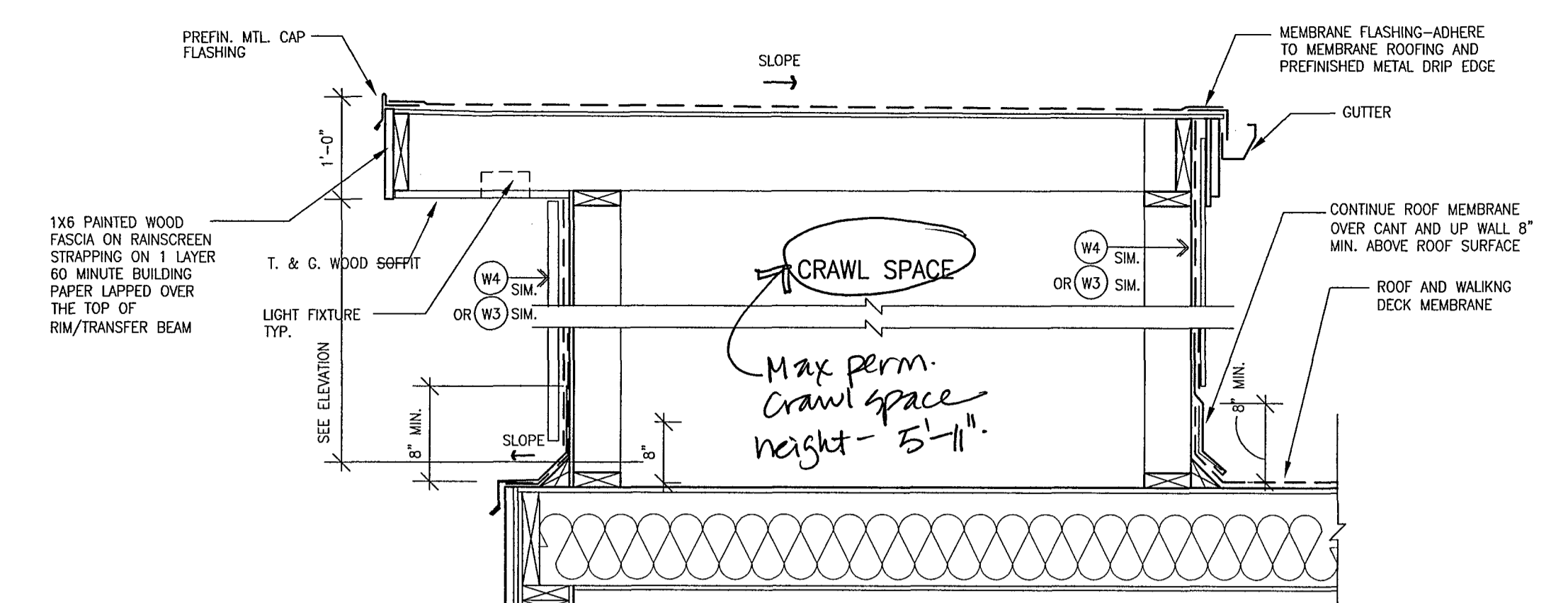
**DETAILS**

Date:  
 Scale:  
 Drawn By:  
 Checked By:  
 Project No.:  
 Drawing No.:

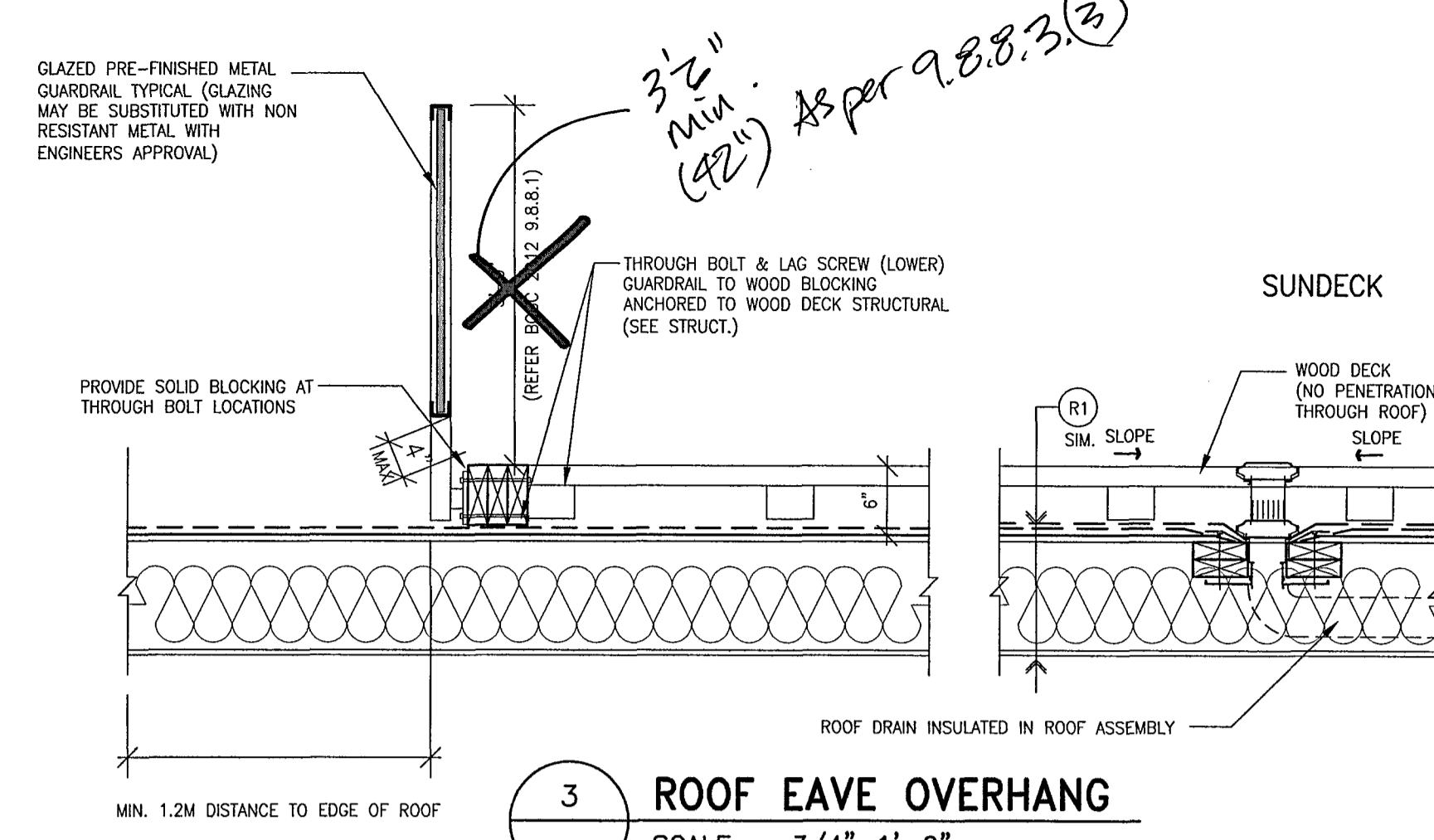
*3 1/2" Min. (P2") AS per 9.8.8.3.2*



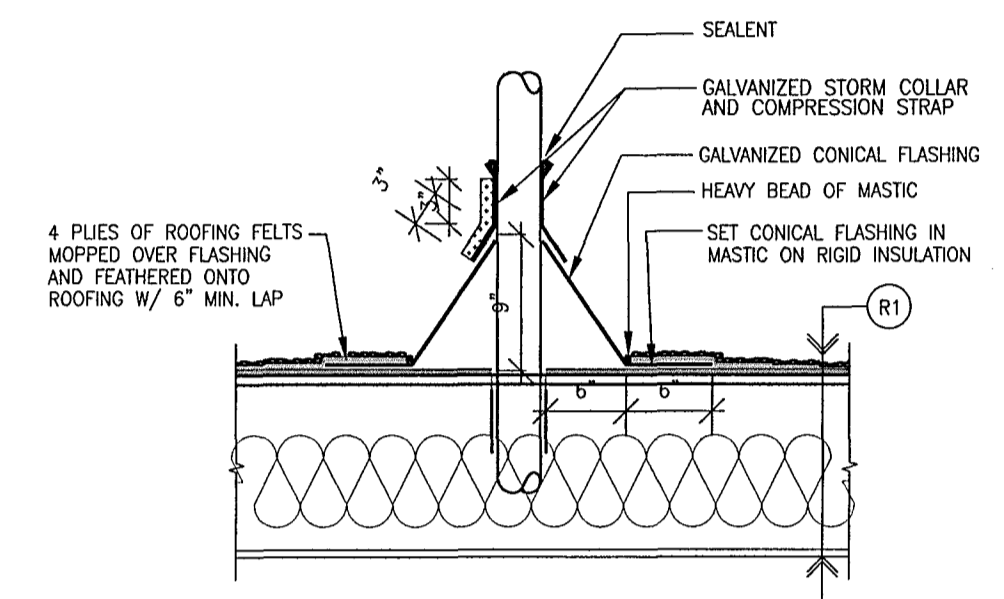
**1 ROOF DETAIL**  
 SCALE: 3/4"=1'-0"



**2 ROOF EAVE OVERHANG**  
 SCALE: 3/4"=1'-0"



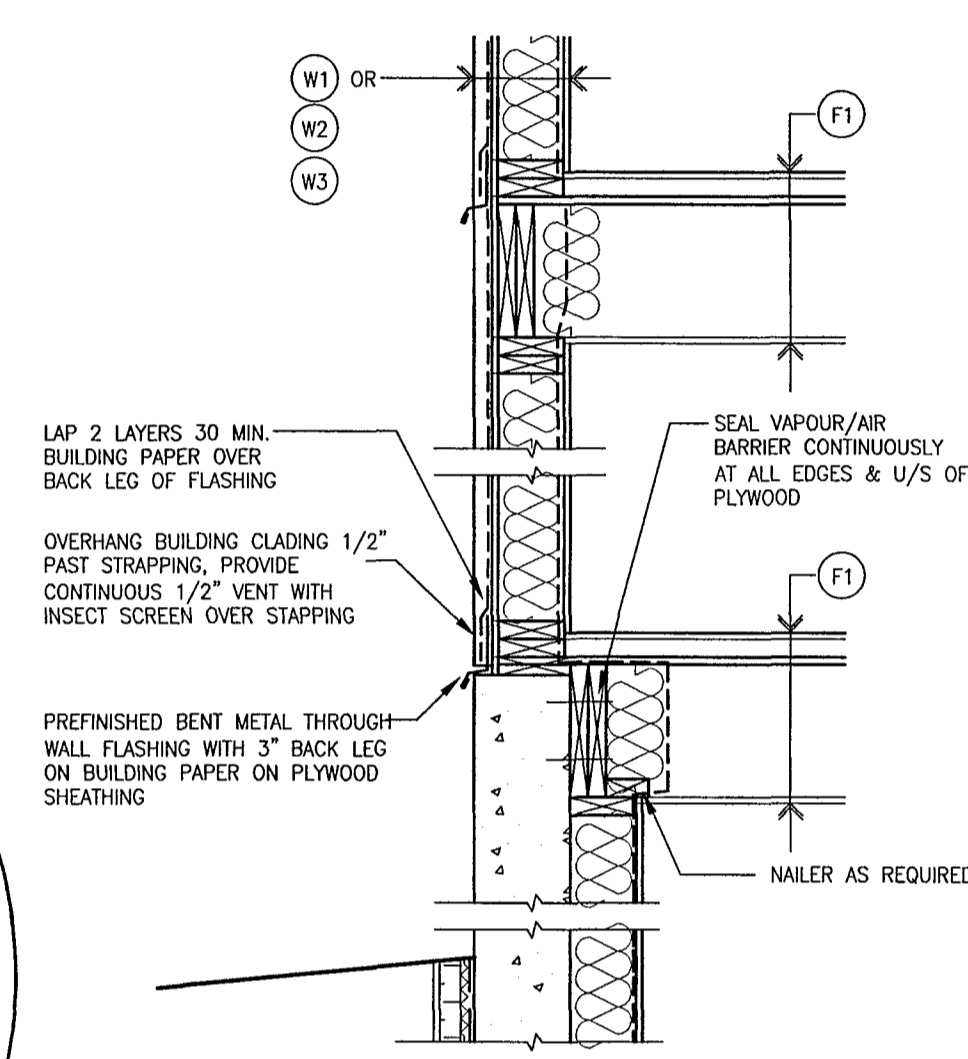
**3 ROOF EAVE OVERHANG**  
 SCALE: 3/4"=1'-0"



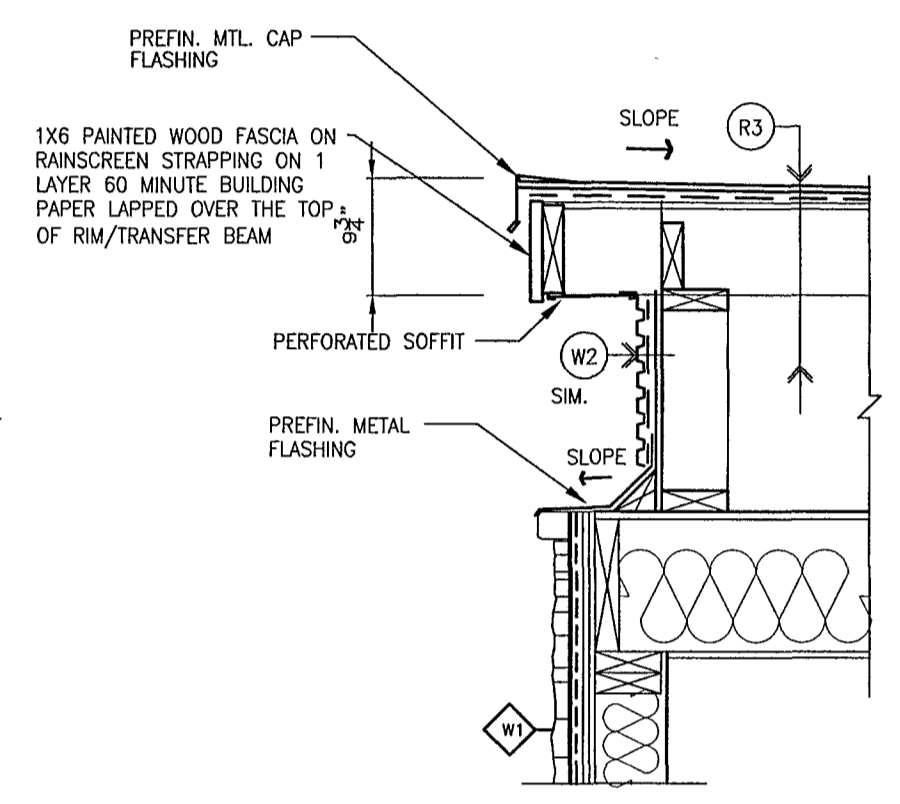
**4 TYPICAL ROOF PENETRATION DETAIL**  
 N.T.S.

- NOTES:**
- ALL WINDOWS MUST MEET A MINIMUM THERMAL INSULATION PERFORMANCE LEVEL.
  - 40% OF PERMANENT LIGHT FIXTURES MUST BE HARD-WIRED TO NOT ACCEPT INCANDESCENT OR HALOGEN BULBS. IN AREAS OF LIGHTS ARE TO BE LEFT ON FOR LONG PERIODS, COMPACT FLUORESCENT (CFL) OR LED TYPE IS RECOMMENDED.
  - AN IN-HOME DISPLAY UNIT FOR ELECTRICITY CONSUMPTION MUST BE INSTALLED IN KITCHEN, HALLWAY OR LIVING ROOM AREAS.
  - INSULATION MUST BE WRAPPED AROUND ALL ELECTRICALLY-POWERED HOT WATER HEATER AND ON A PORTION OF THE PIPE LEADING TO AND FROM BOTH ELECTRIC AND GAS-POWERED WATER HEATERS.
  - INSULATION IS REQUIRED ON THE ENTIRE HOT WATER PIPING NETWORK, IF THE NETWORK IS A CONSTANT RECIRCULATION SYSTEM.
  - ALL GAS-FILLED FIREPLACE ARE REQUIRED TO USE ELECTRIC IGNITION AND TO BE DIRECT-VENTED.
  - ALL TOILETS MUST BE OF DUAL-FLUSH DESIGN.
  - A HEAT RECOVERY VENTILATOR (HRV) MUST BE INSTALLED.
  - TWO 50mm DIAMETER (2") PVC PIPES RUNNING FROM THE BUILDING'S SERVICE ROOM TO THE ATTIC SPACE MUST BE INSTALLED FOR FUTURE ADDITION OF ROOF-MOUNTED SOLAR ENERGY GENERATION SYSTEMS.
  - A CABLE RACEWAY (CONDUIT) FROM THE BUILDING'S ELECTRICAL PANEL TO THE GARAGE MUST BE INSTALLED, LEADING TO AN EMPTY OUTLET BOX IN THE GARAGE FOR FUTURE ELECTRIC VEHICLE CHARGING SYSTEM INSTALLATION.

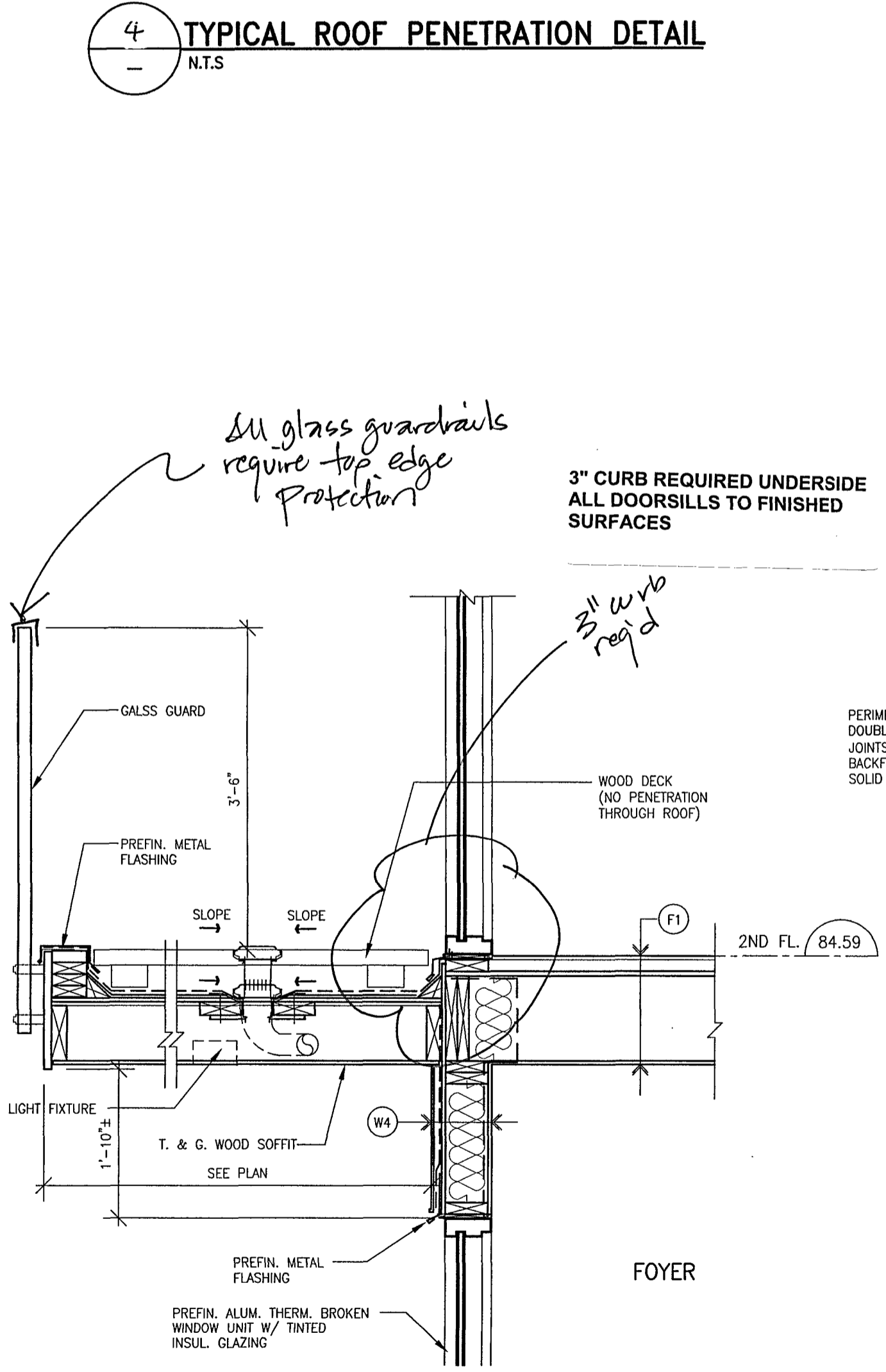
*Refer to rainscreen engineered draws.*



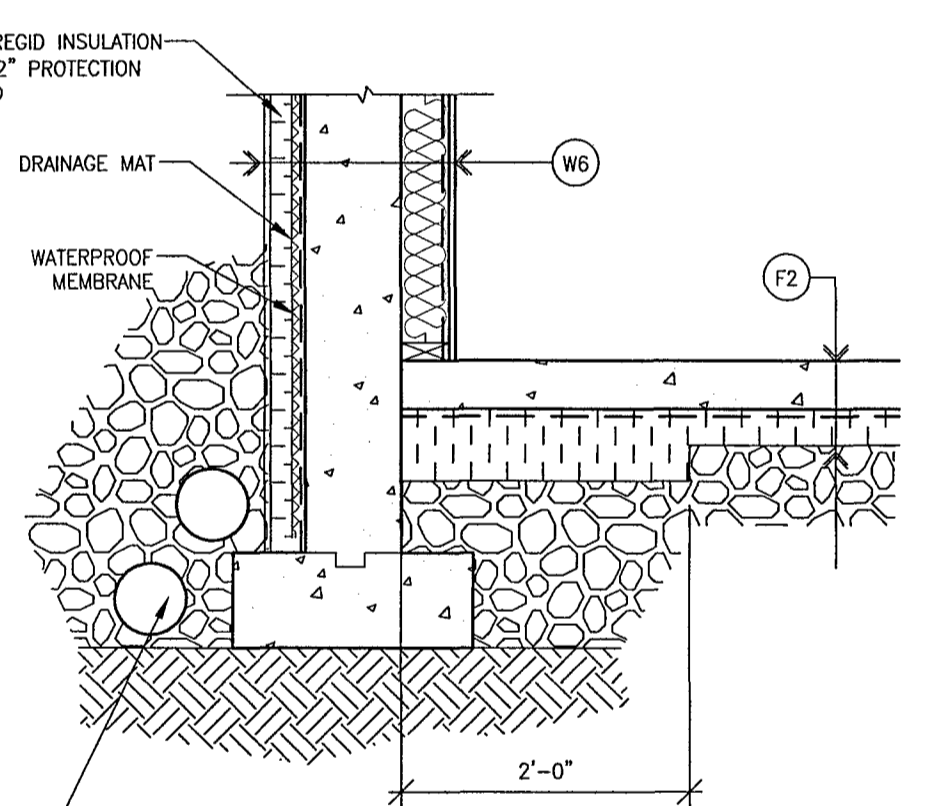
**5 DETAIL**  
 SCALE: 3/4"=1'-0"



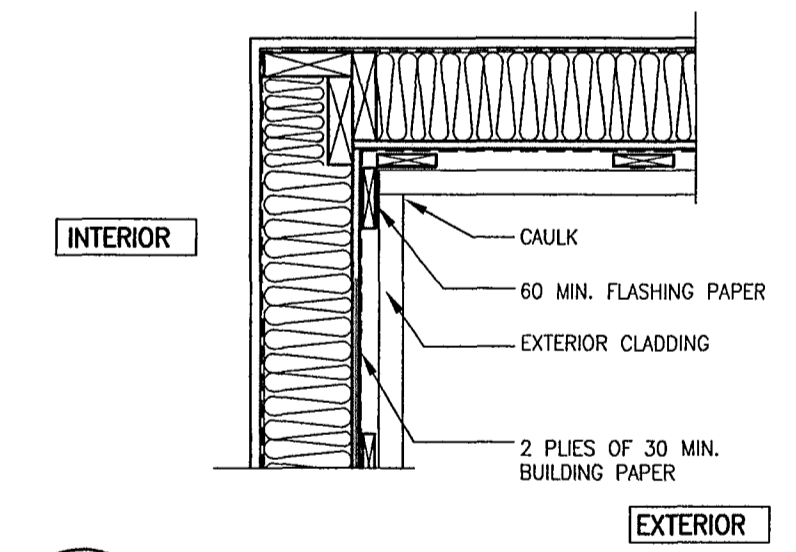
**6 ROOF EAVE OVERHANG (CHIMNEY)**  
 SCALE: 3/4"=1'-0"



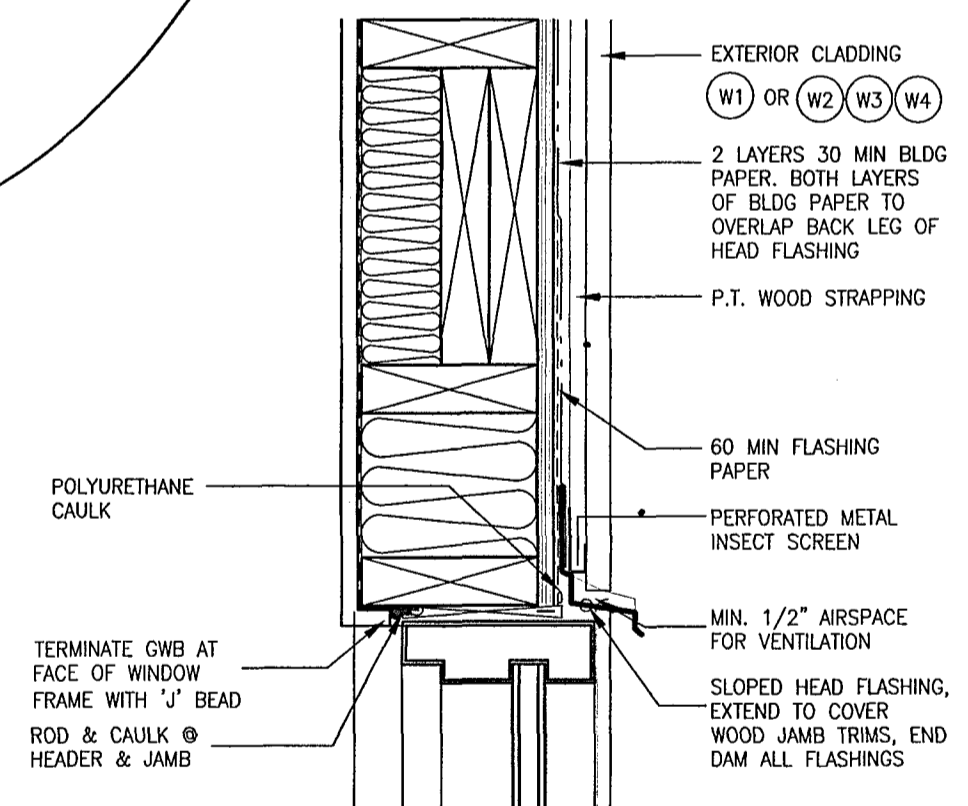
**7 BALCONY/RAILING DETAIL**  
 SCALE: 3/4"=1'-0"



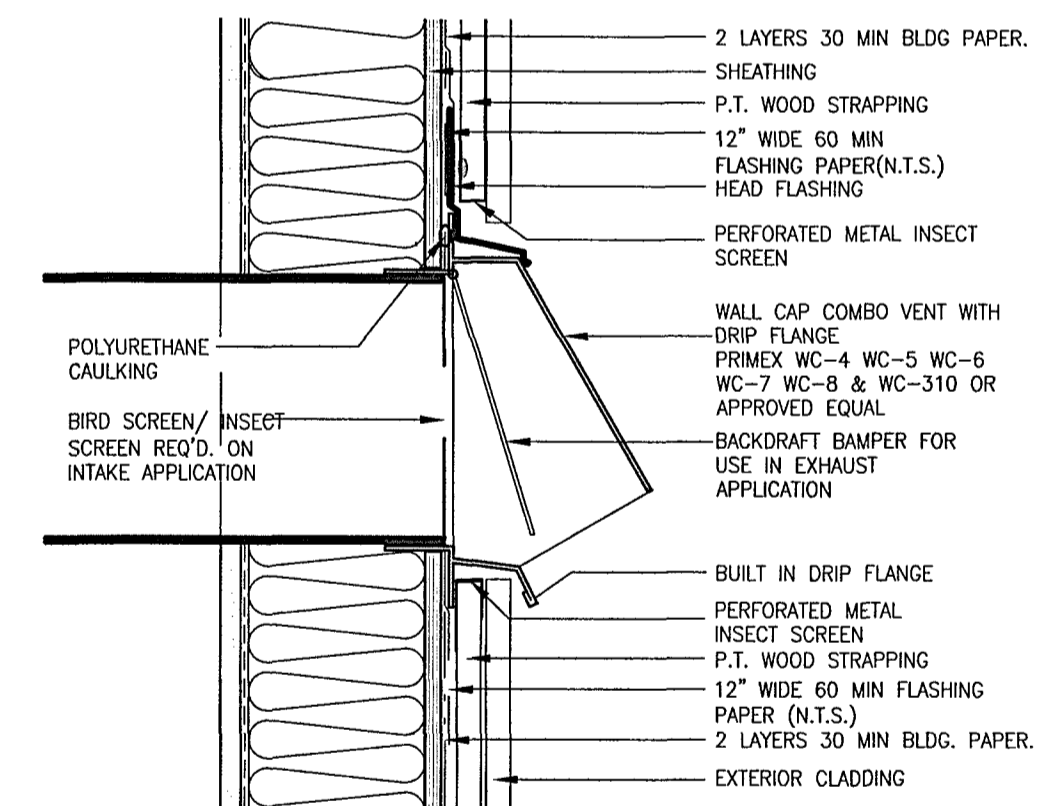
**16 DETAIL**  
 SCALE: 3/4"=1'-0"



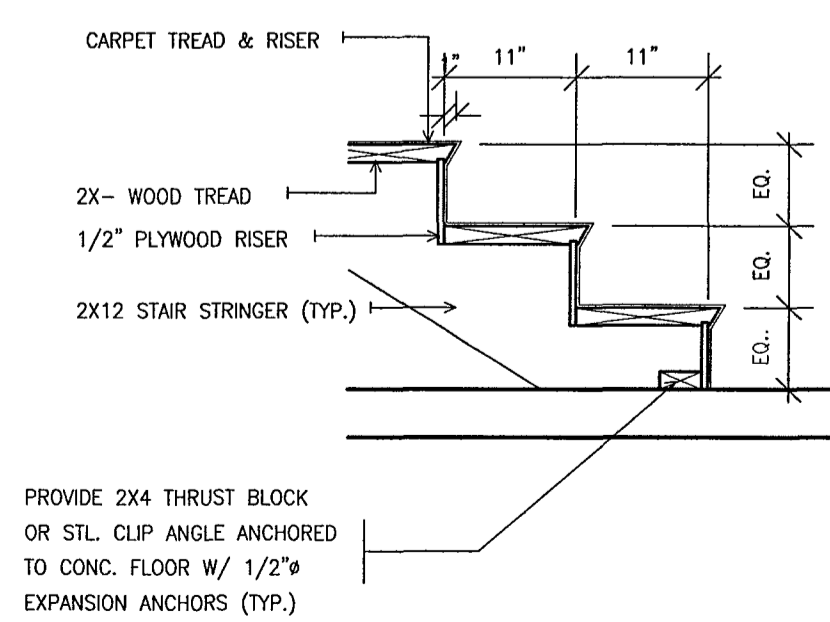
**9 TYPICAL INT. CORNER**  
 SCALE: 2"=1'-0"



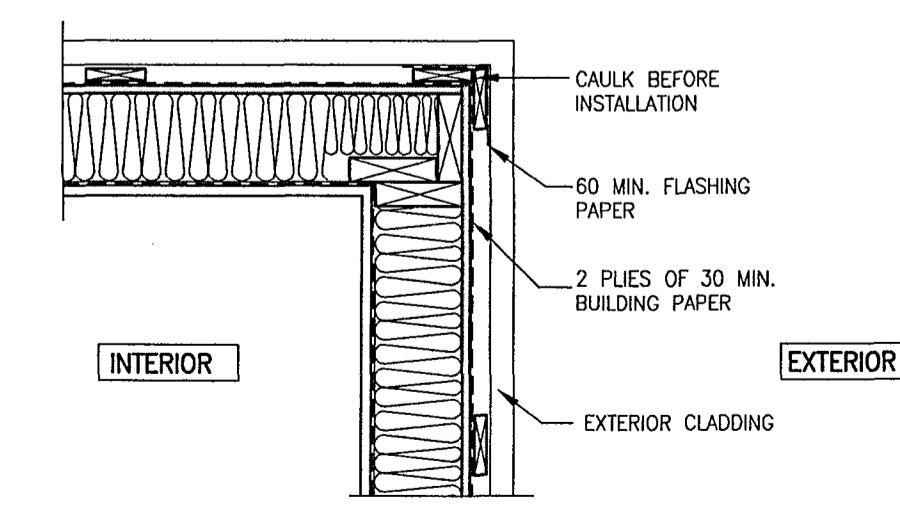
**10 TYPICAL WINDOW HEAD DETAIL**  
 SCALE: 2"=1'-0"



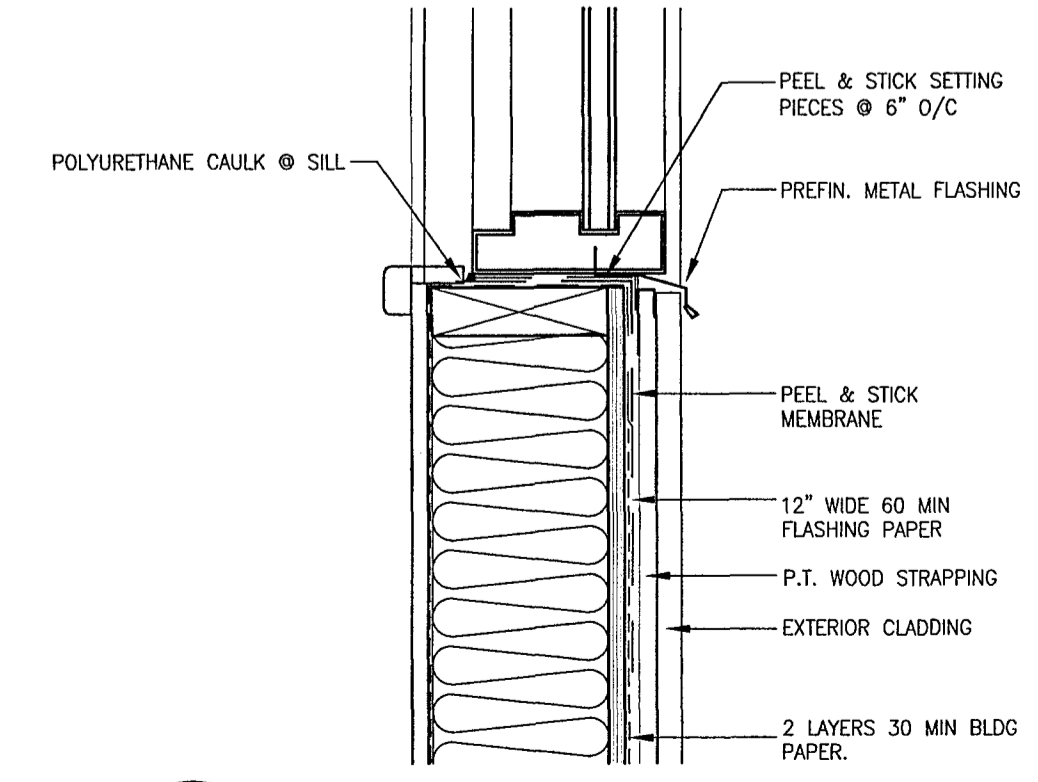
**11 VENT CAP INSTALLATION DETAIL**  
 SCALE: 2"=1'-0"



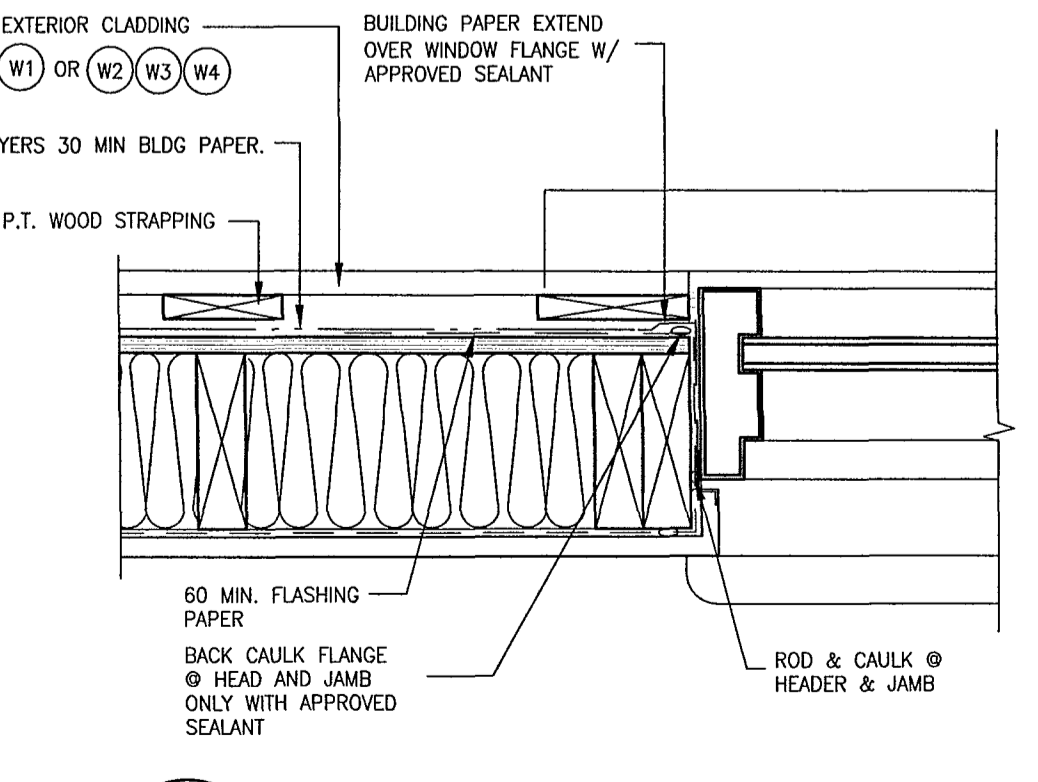
**8 STAIR DETAIL**  
 SCALE: 3/8"=1'-0"



**13 TYPICAL EXT. CORNER**  
 SCALE: 2"=1'-0"



**14 TYPICAL WINDOW SILL DETAIL**  
 SCALE: 2"=1'-0"



**15 TYP. WINDOW JAMB**  
 SCALE: 2"=1'-0"

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Date: Issued For:

A A DETAIL NUMBER  
B B LOCATION SHEET  
C C DETAIL SHEET

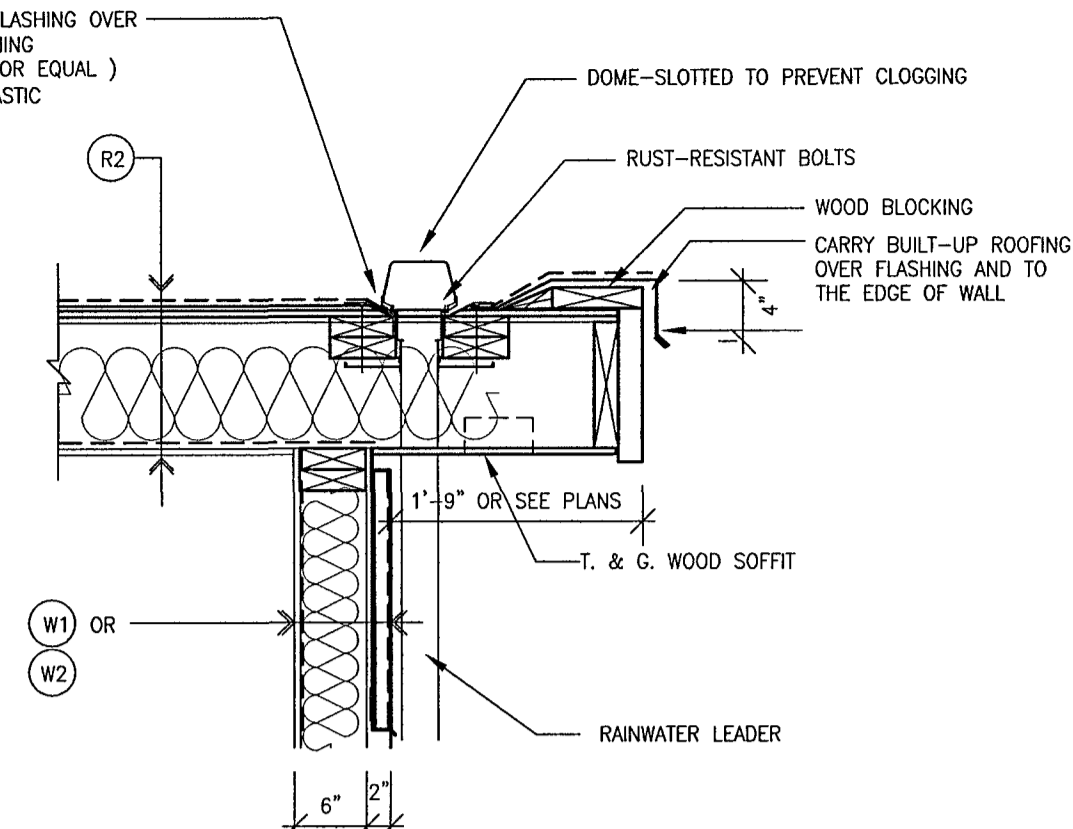
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Project:  
14423 Blackburn Cres.  
Whiterock, B.C.

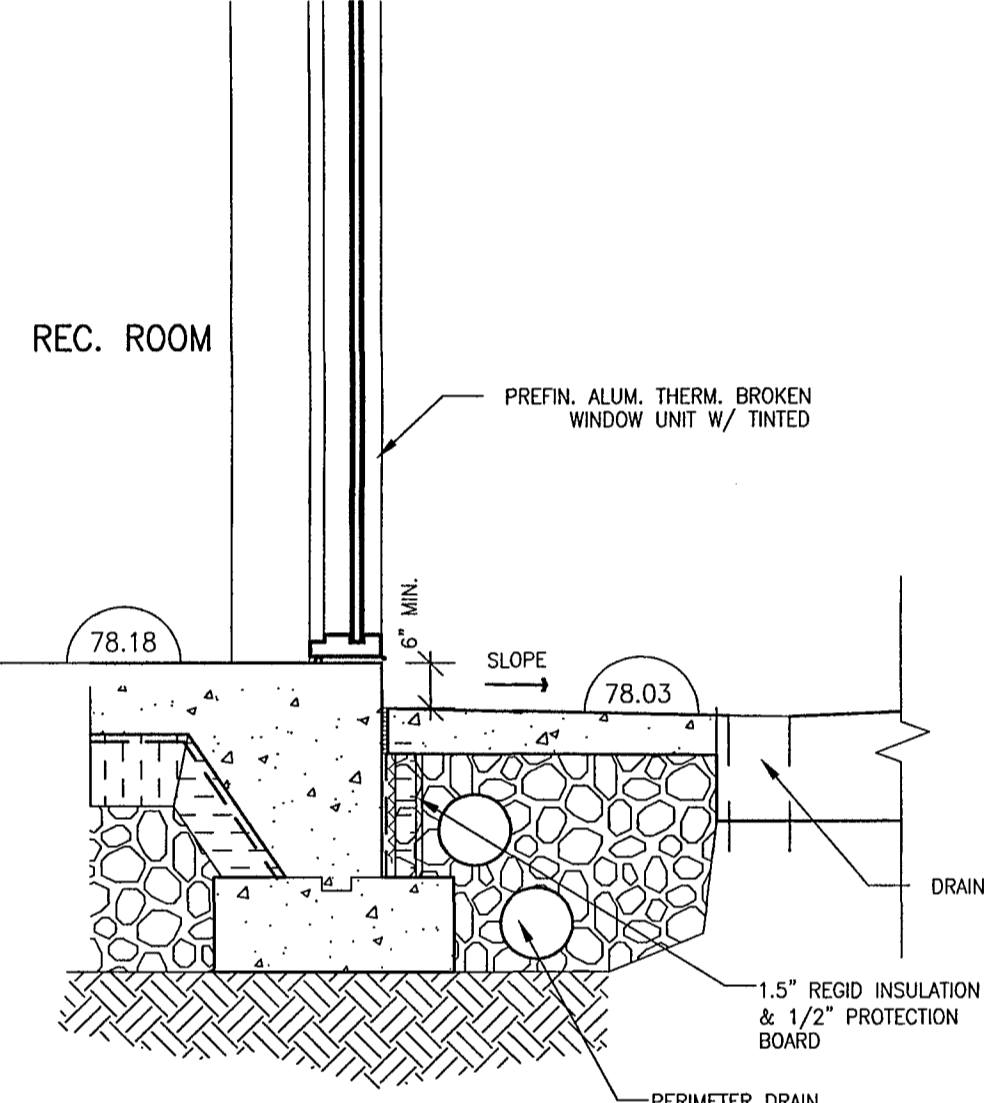
14423 Blackburn Cres.  
Whiterock, B.C.

Drawing Title:  
DETAILS

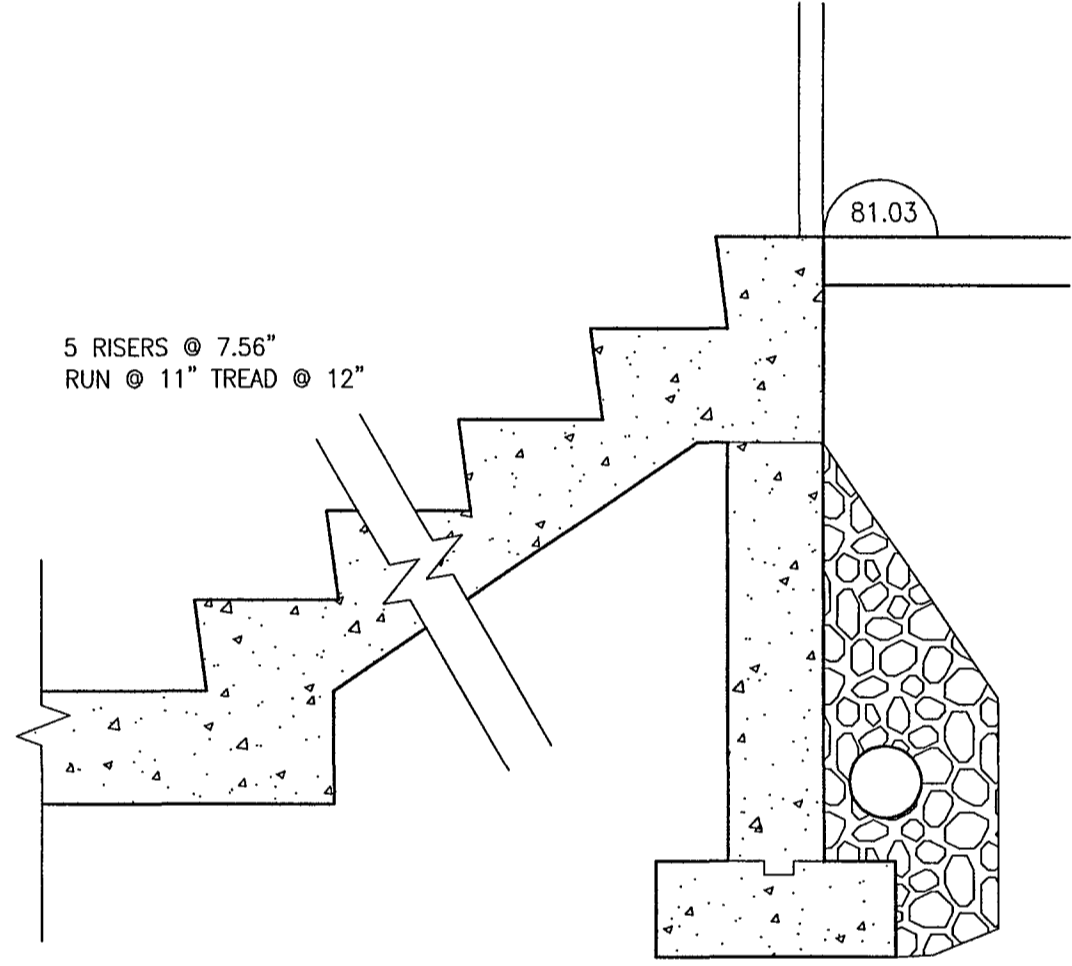
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Checked By:  
Project No.:  
Drawing No.:



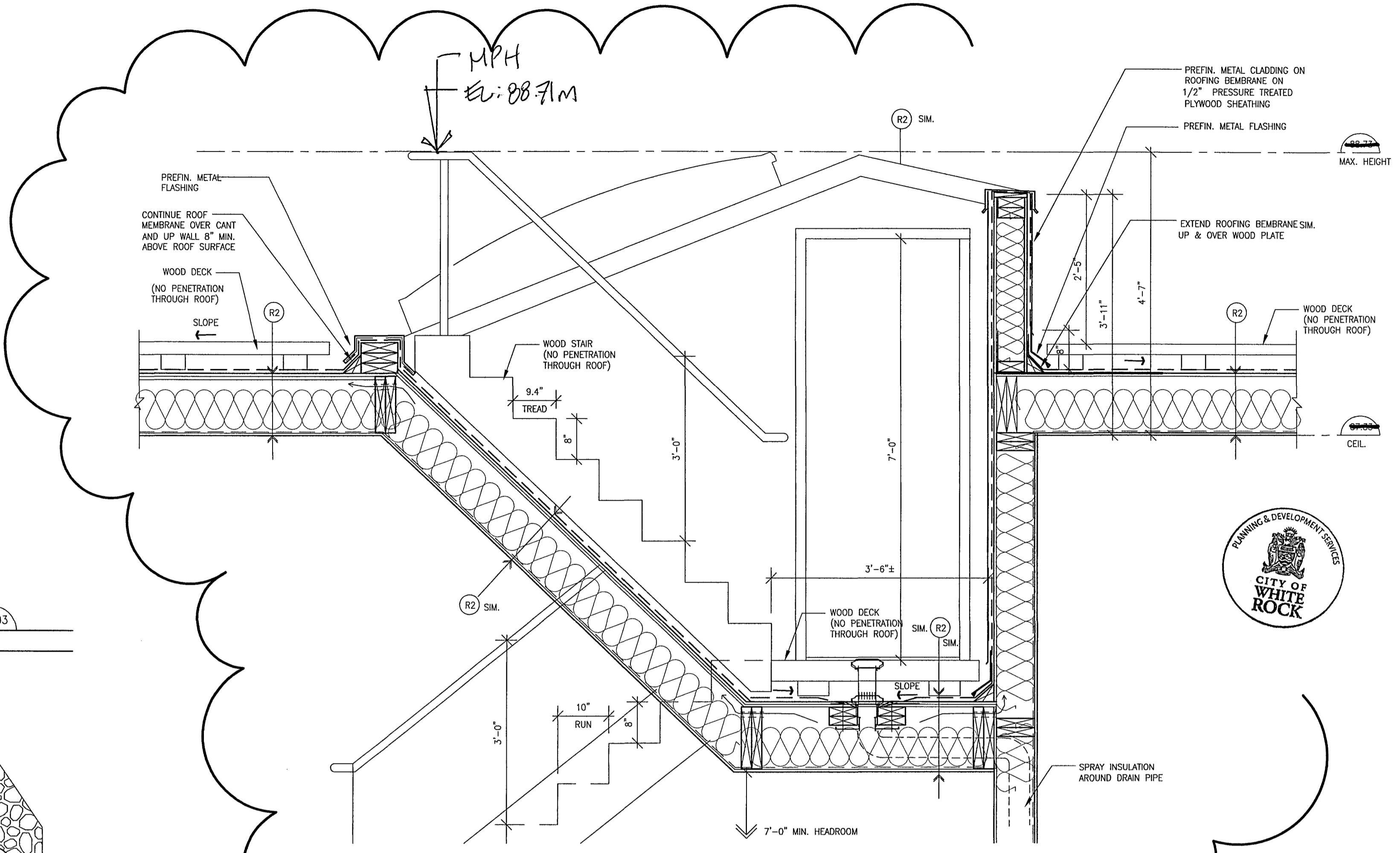
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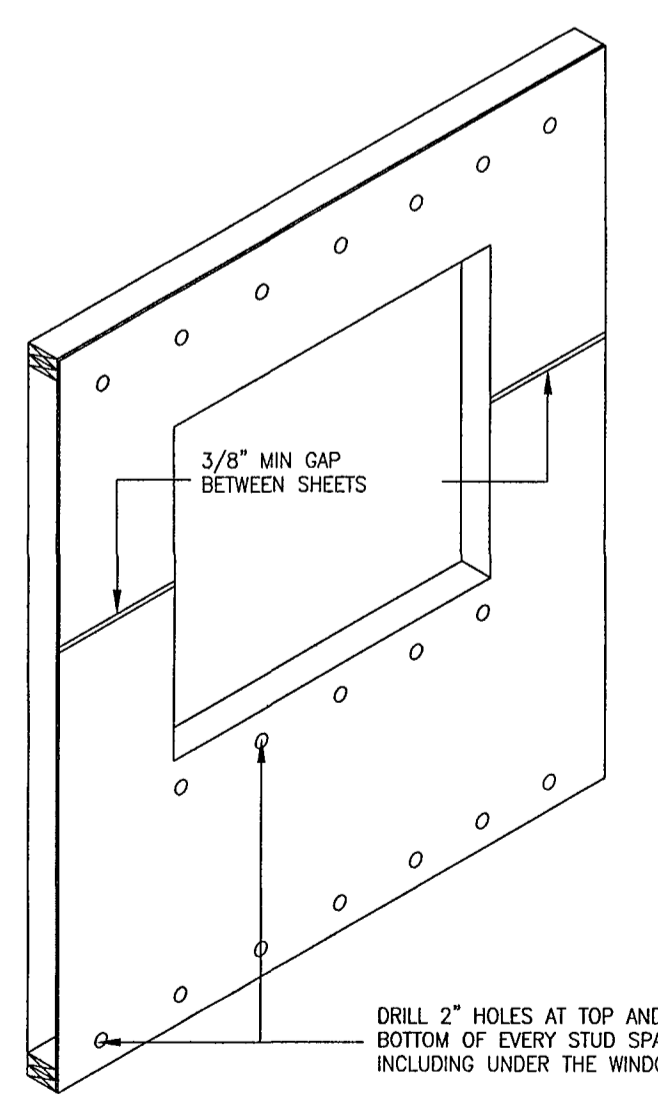
3 DETAIL 3  
SCALE: 3/4"=1'-0"



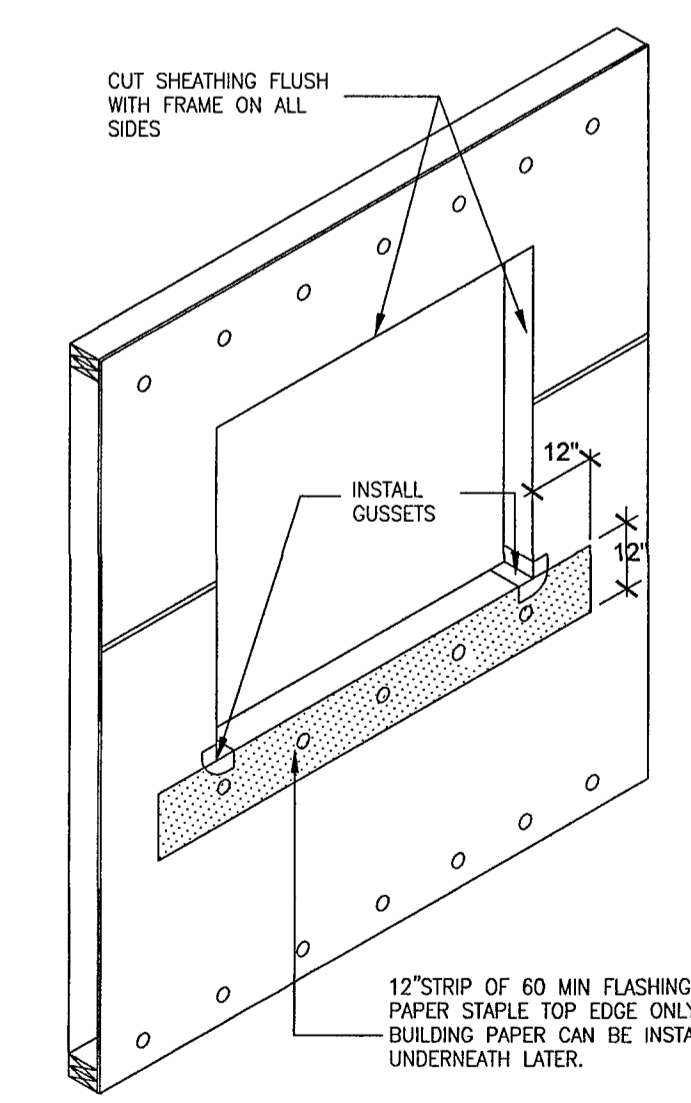
4 DETAIL 4  
SCALE: 3/4"=1'-0"



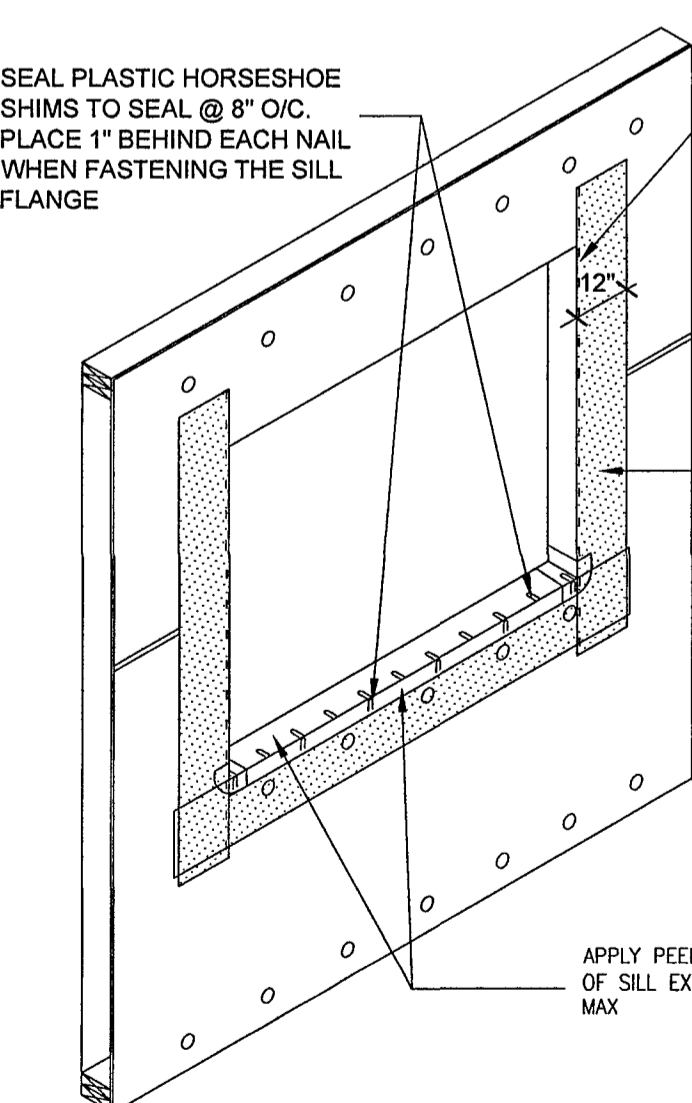
2 DETAIL 2  
SCALE: 3/4"=1'-0"



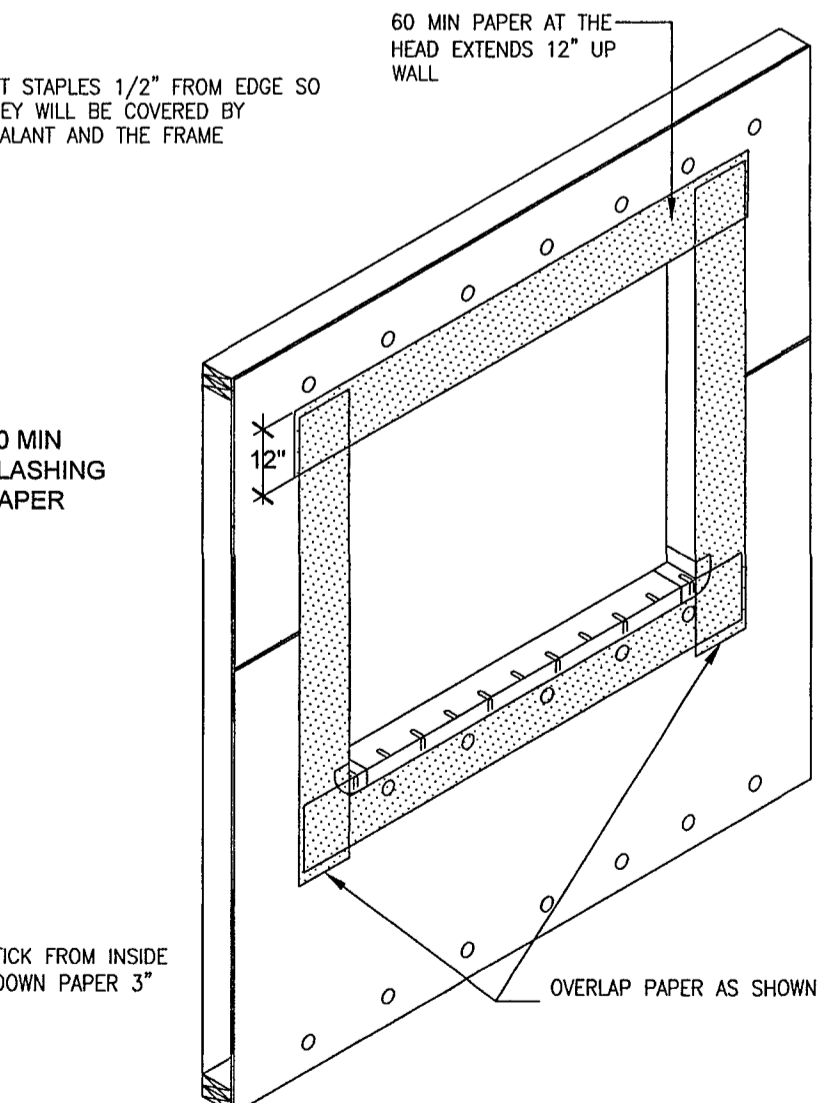
1. ROUGH OPENING



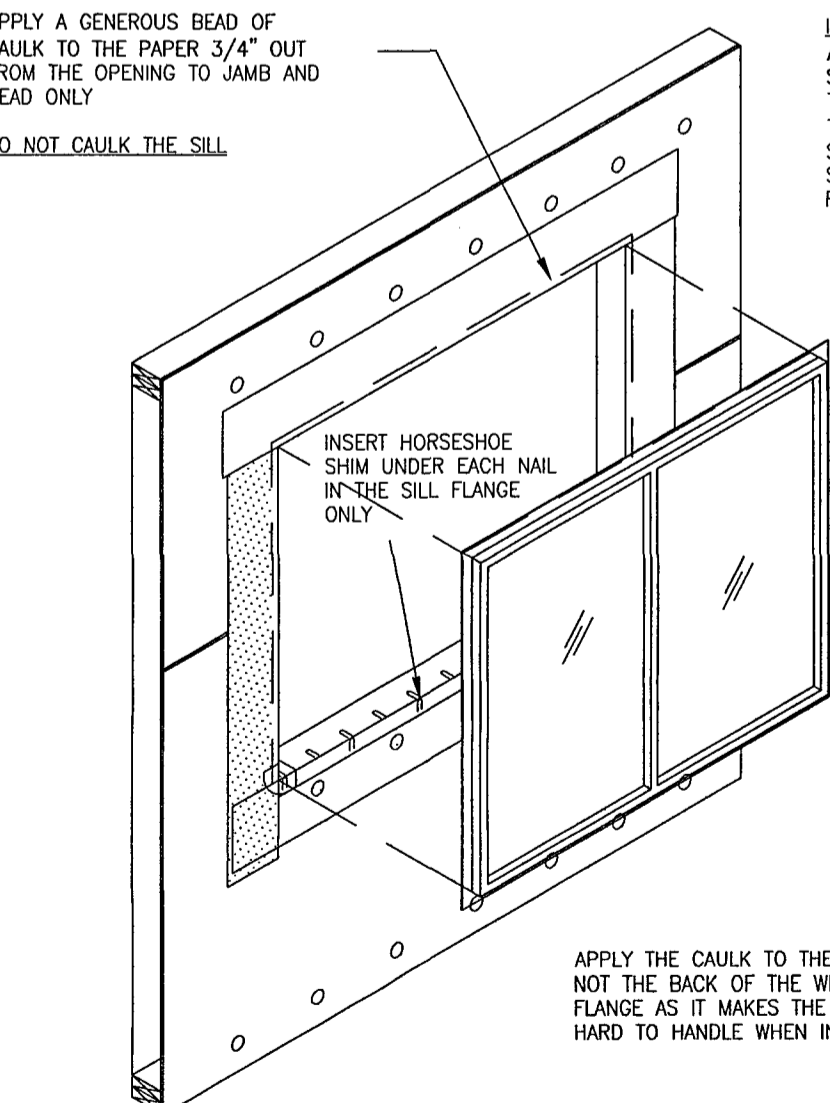
2. SILL FLASHING PAPER & GUSSETS



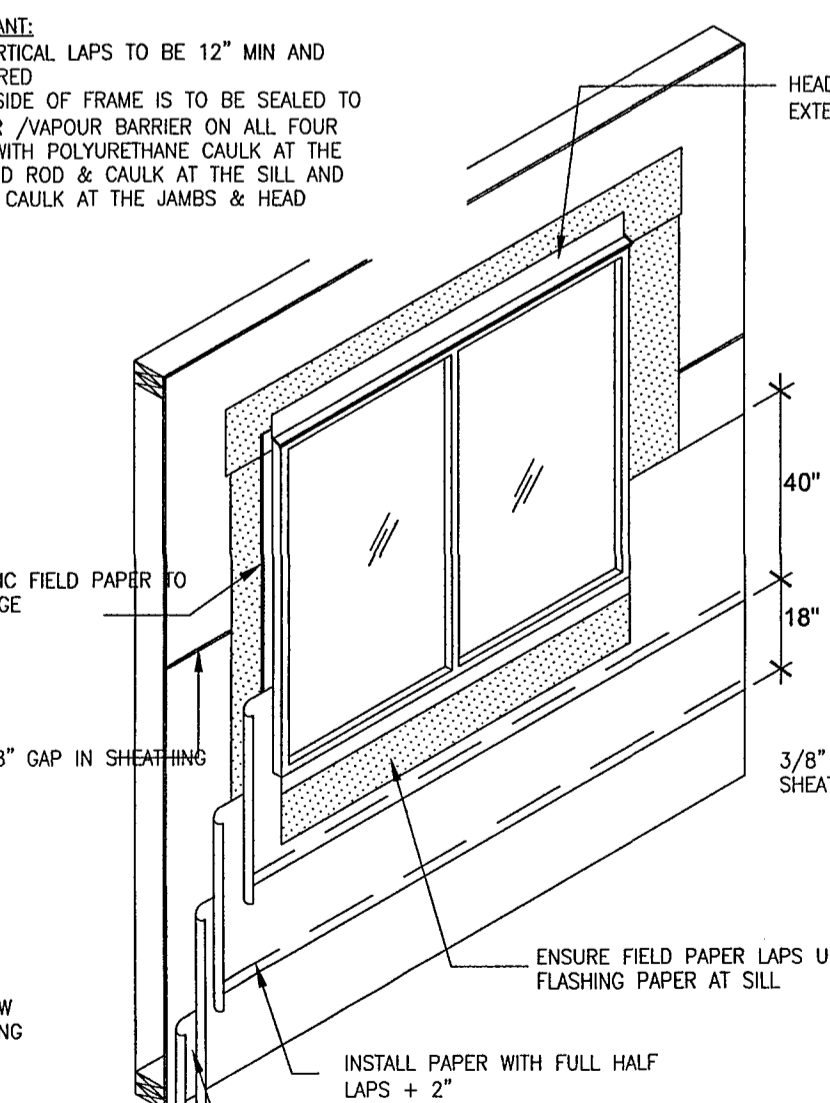
3. PEEL & STICK & JAMB FLASHING



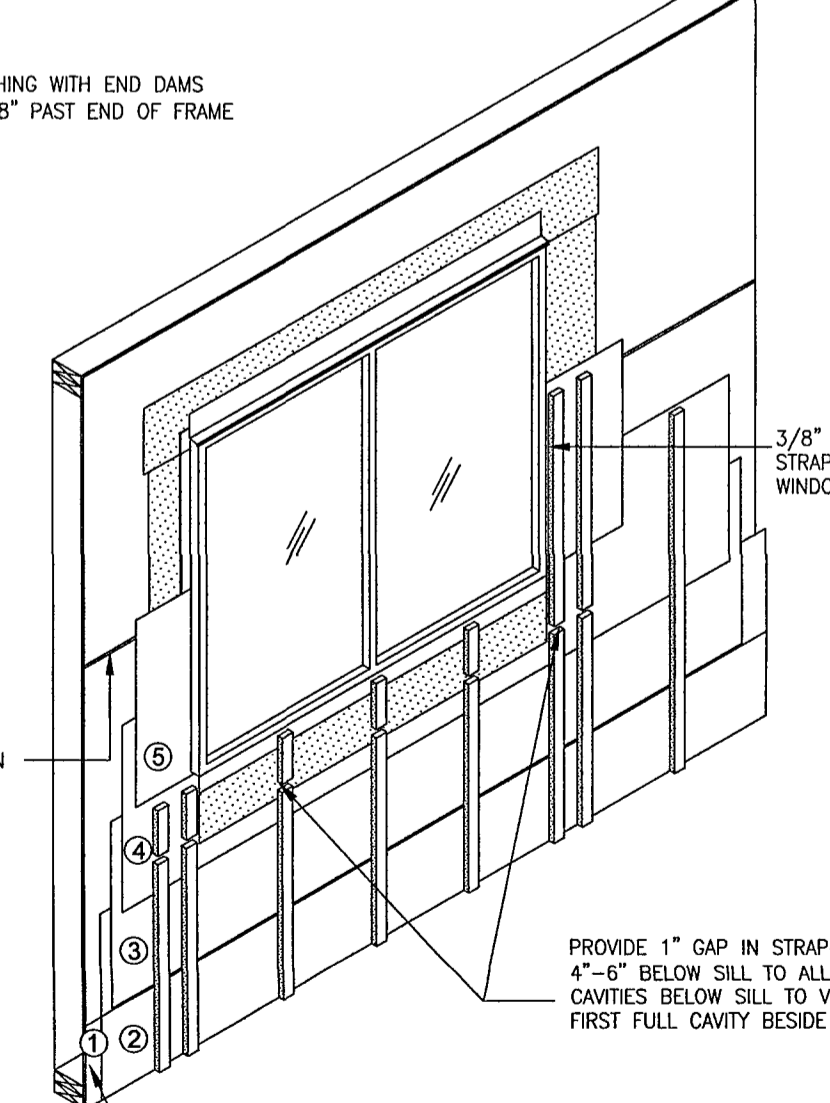
4. HEAD FLASHING PAPER



5. WINDOW INSTALLATION



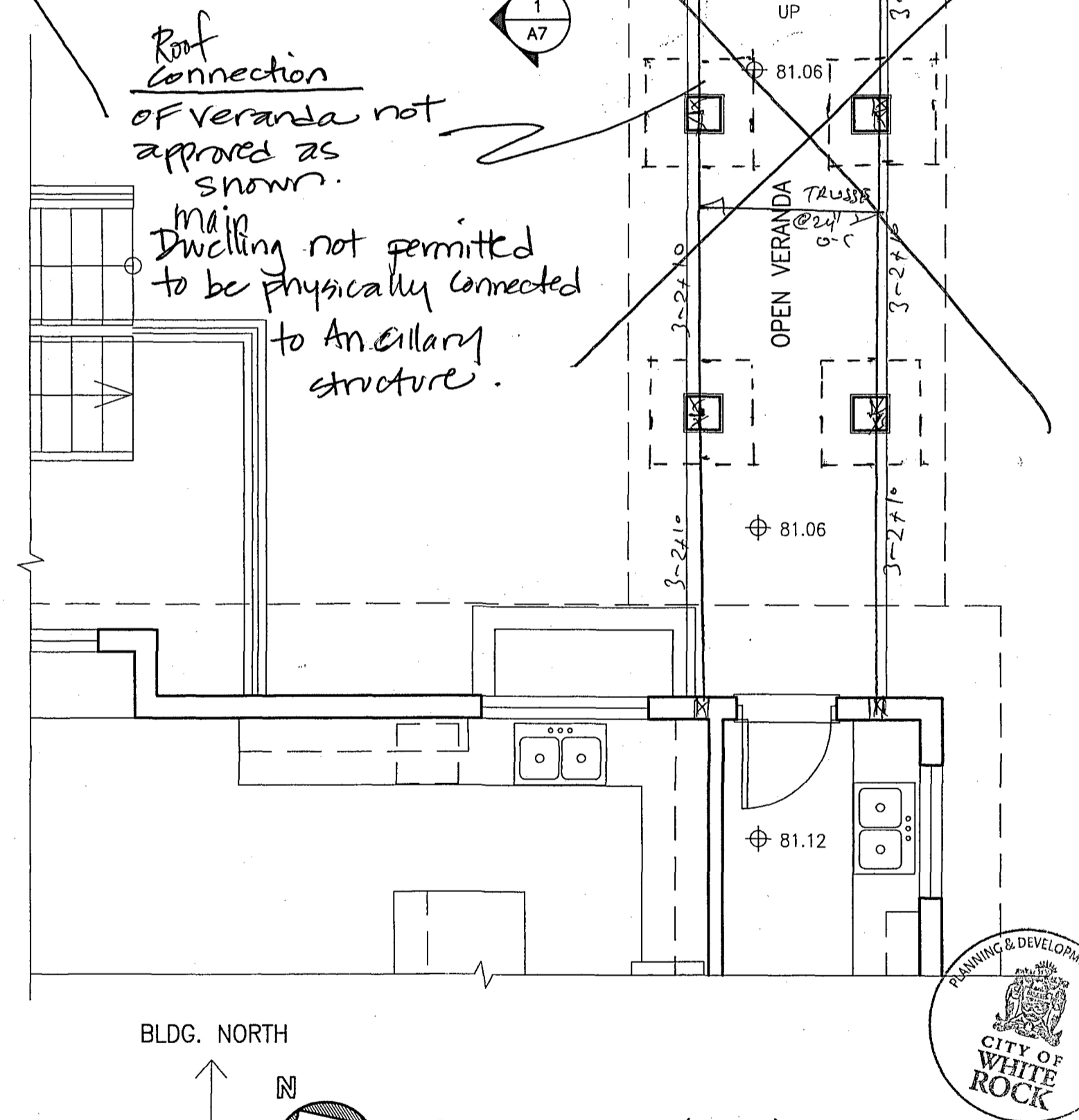
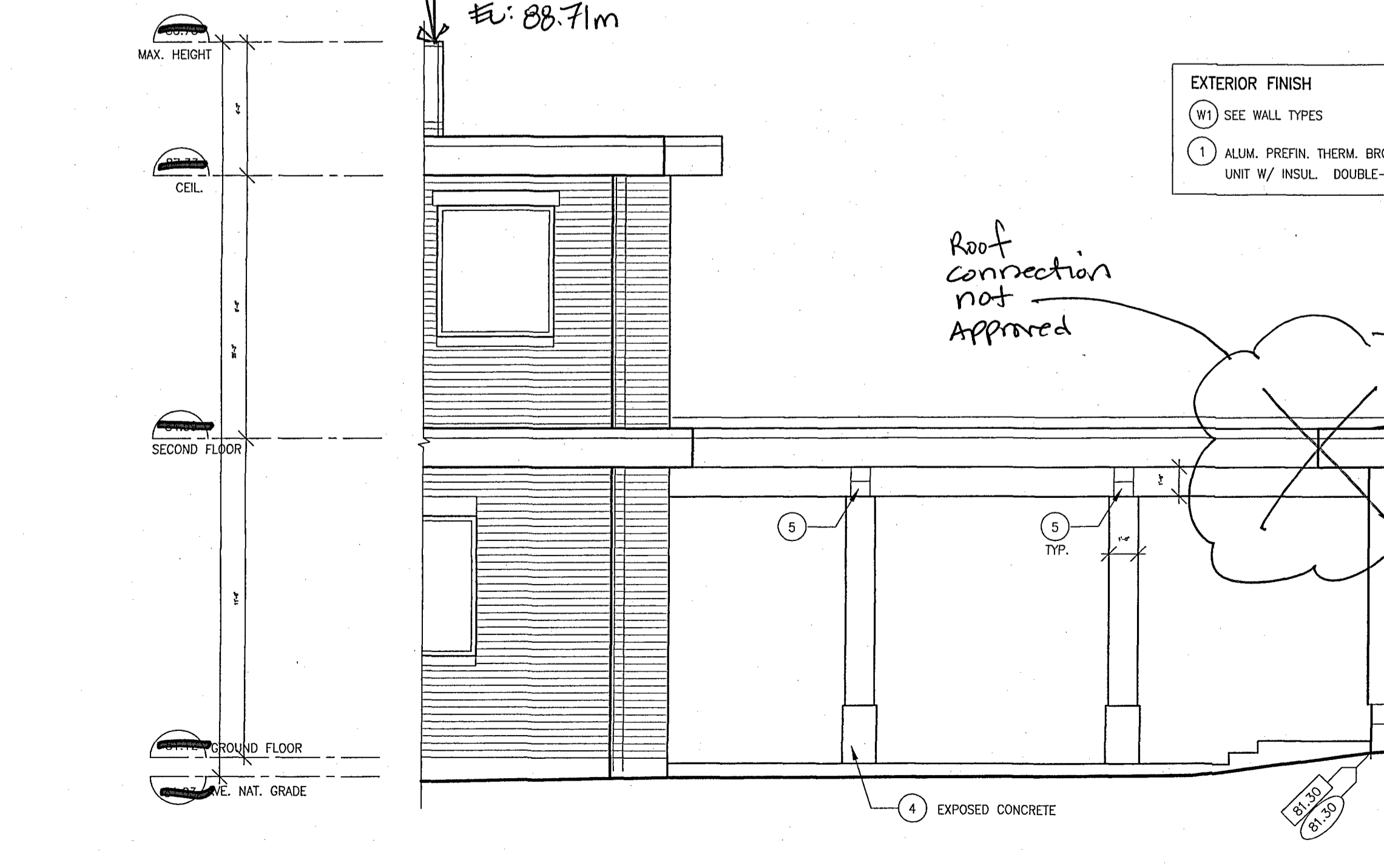
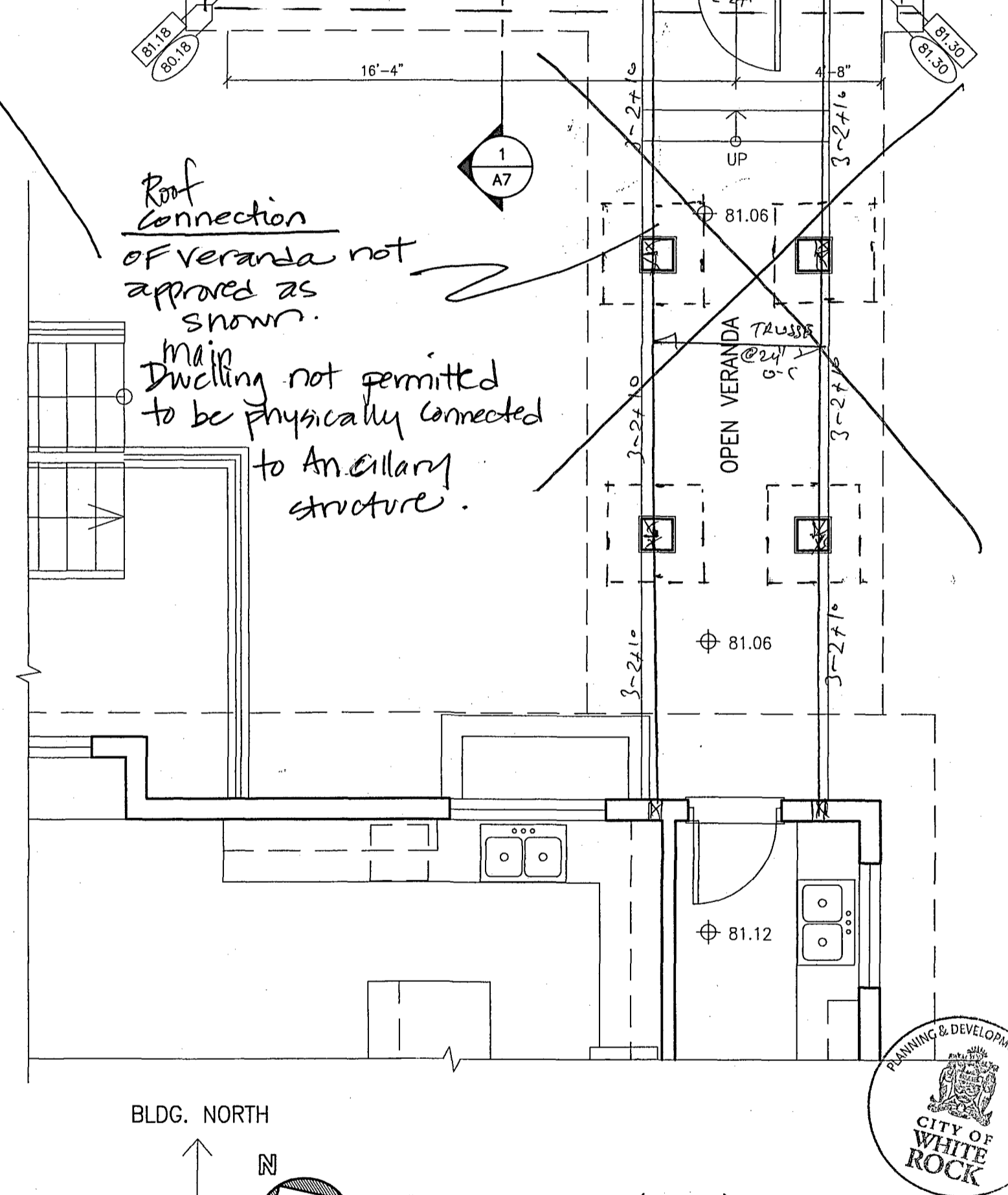
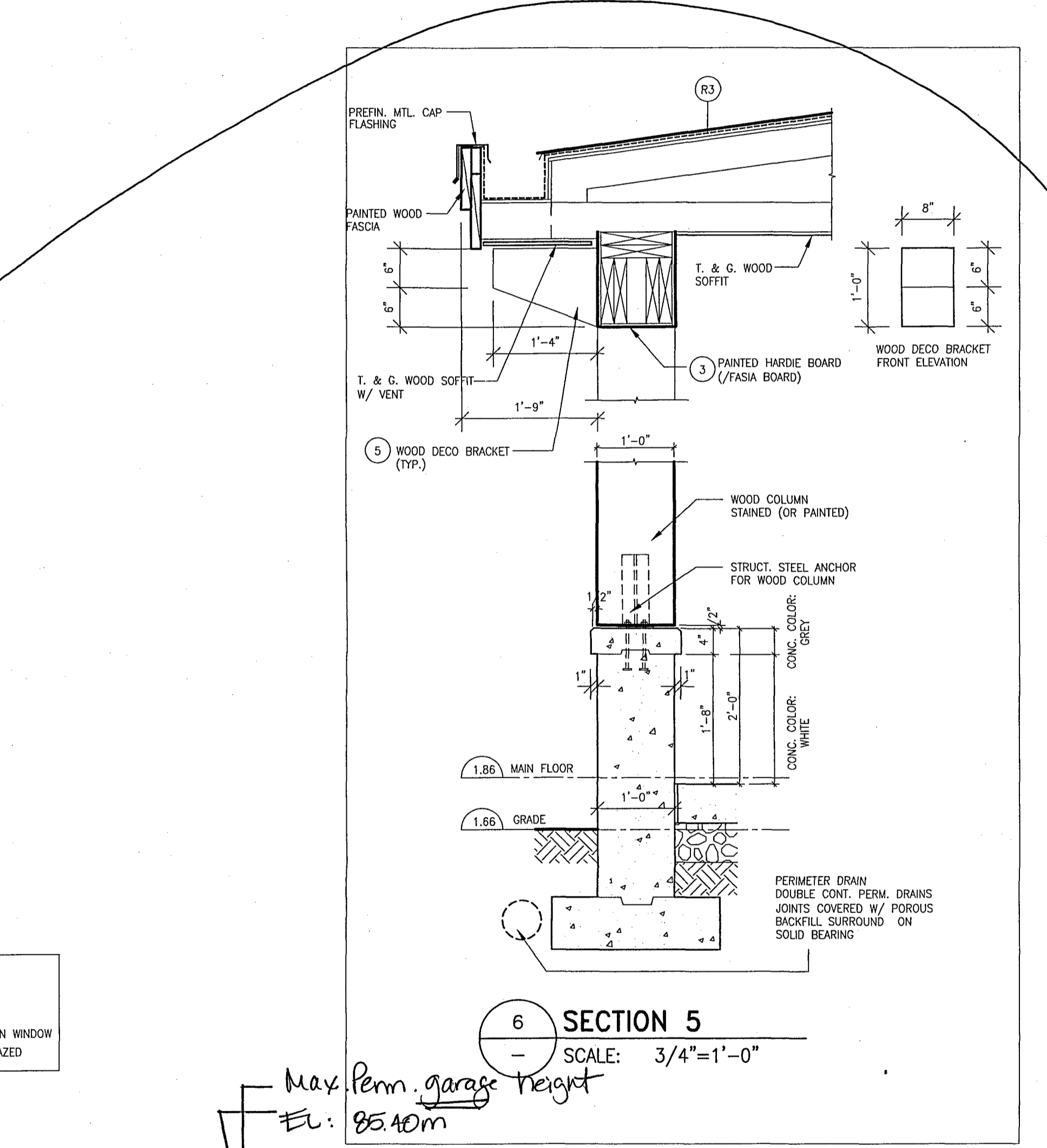
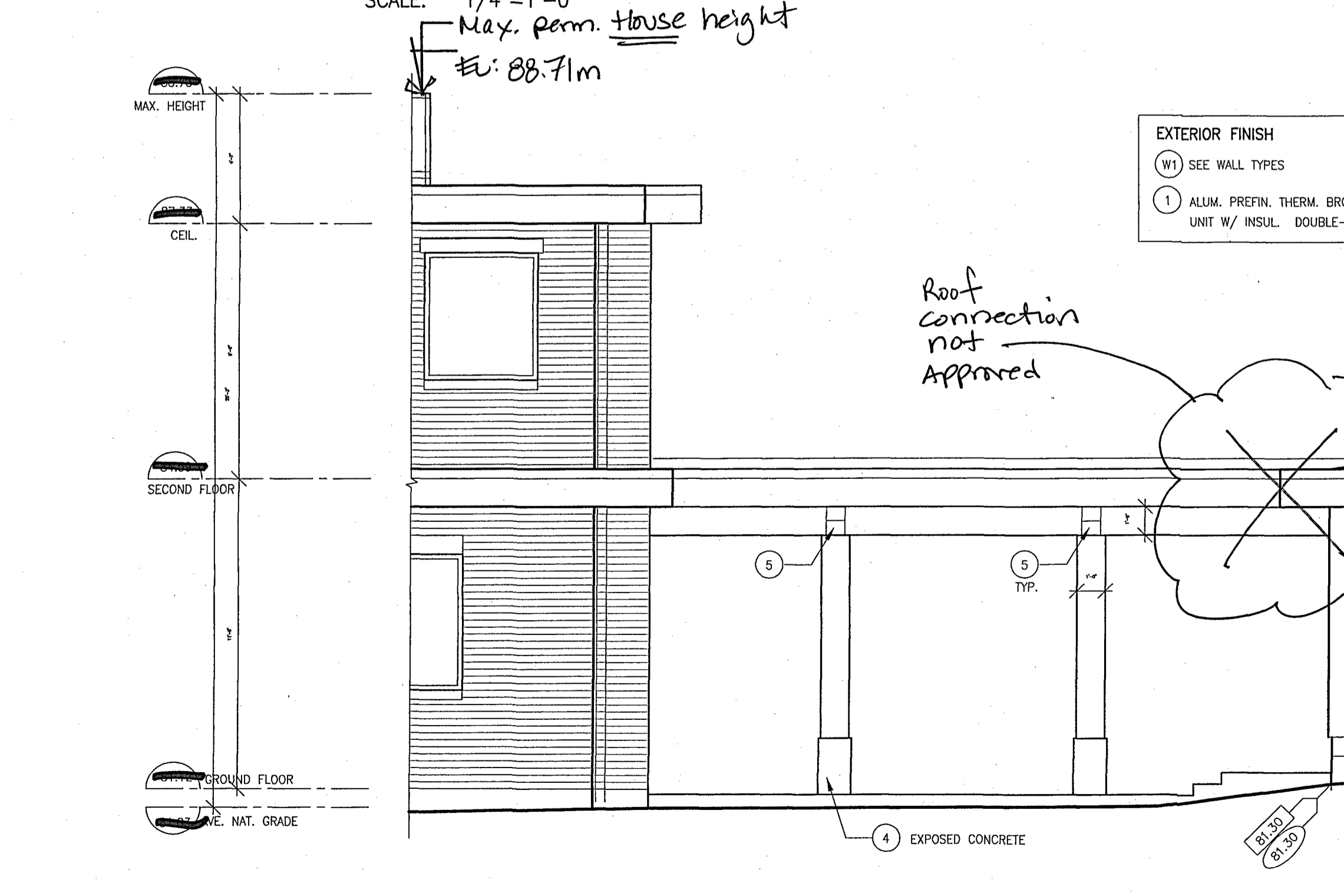
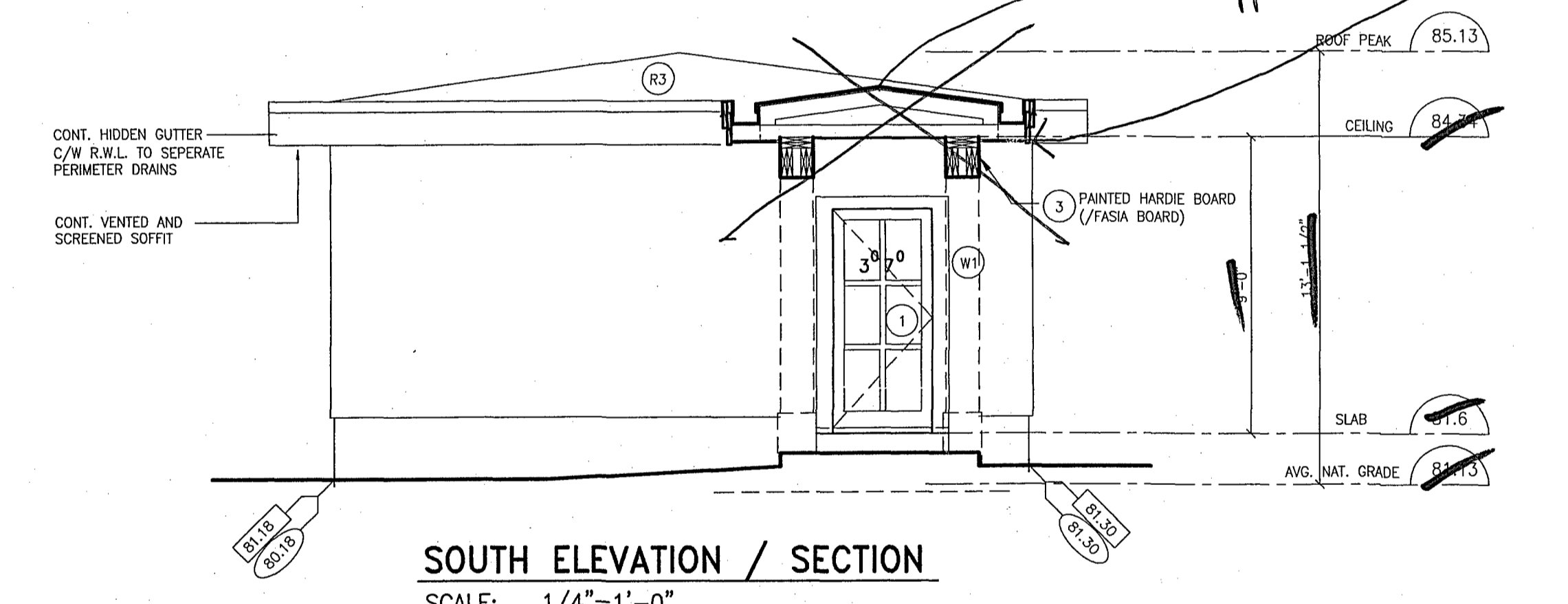
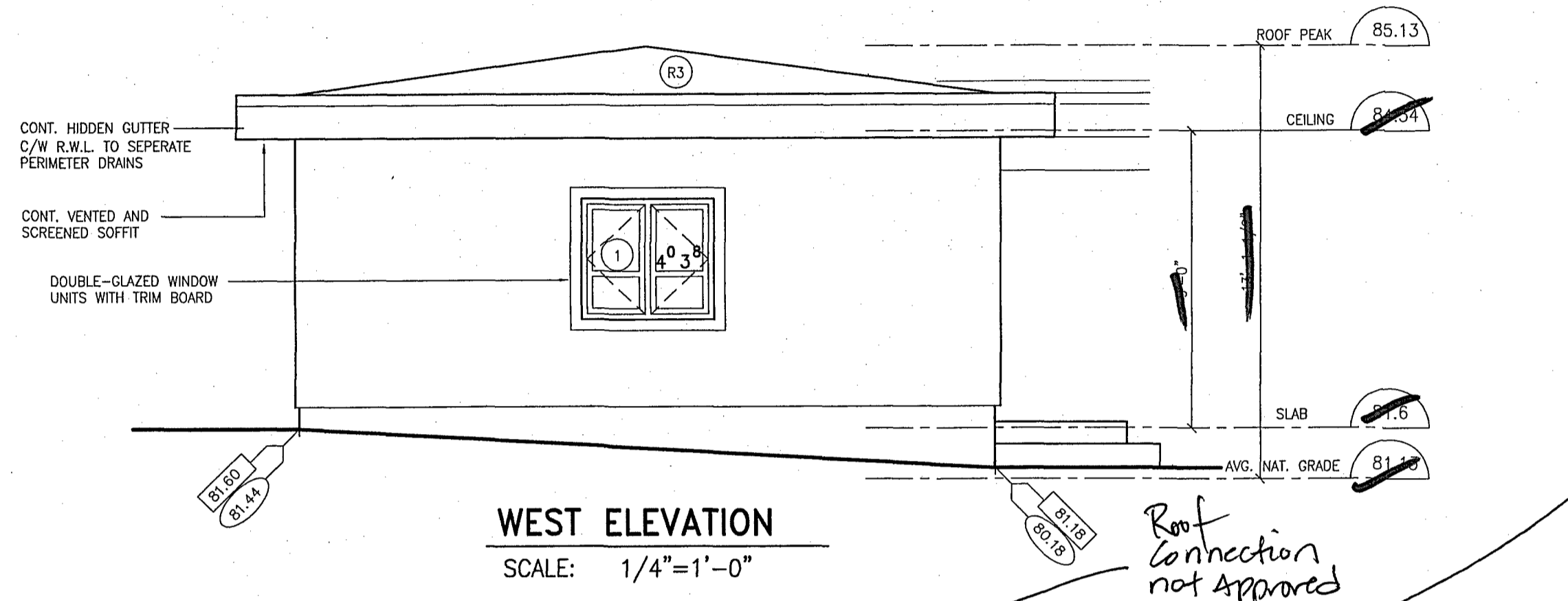
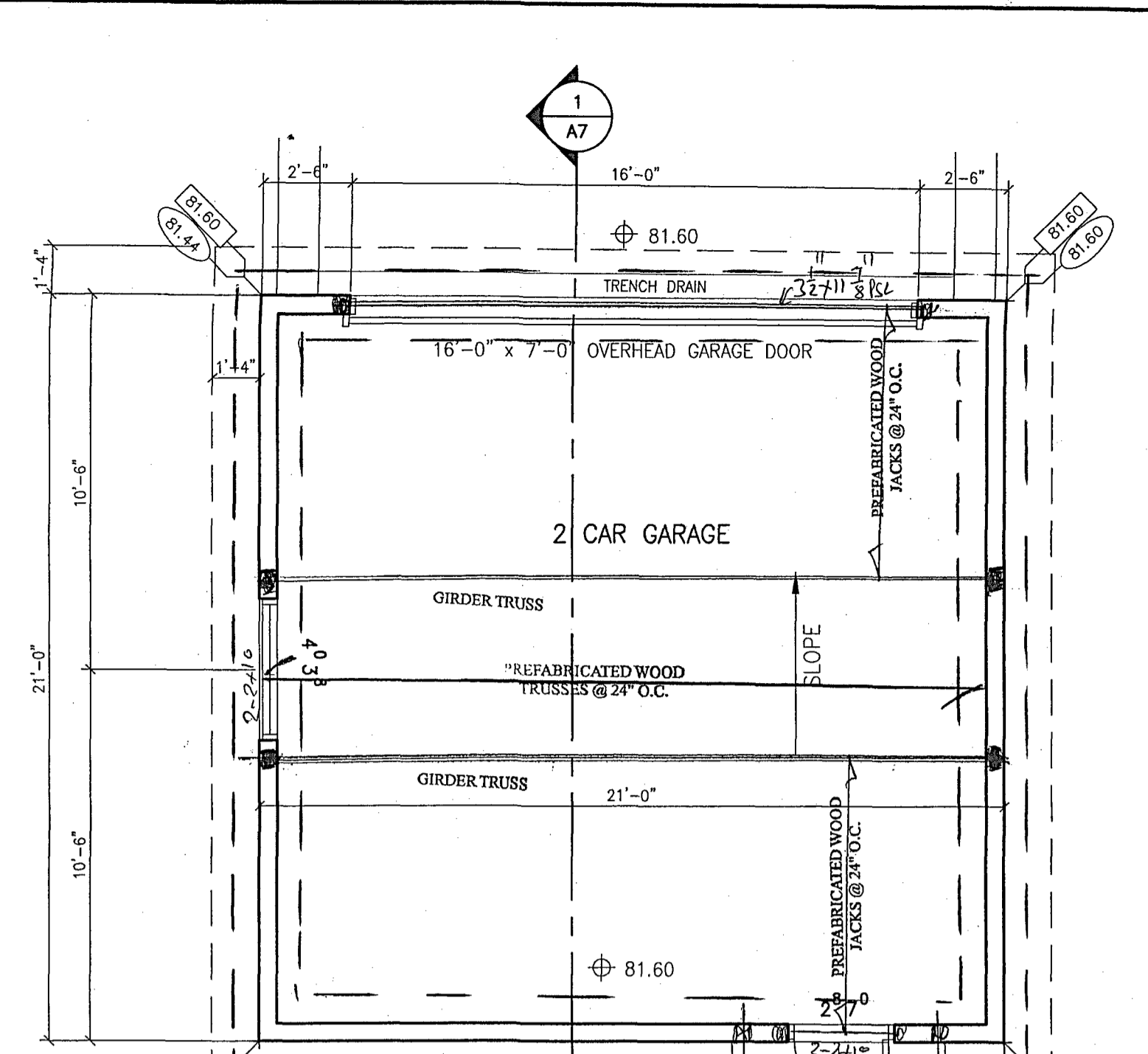
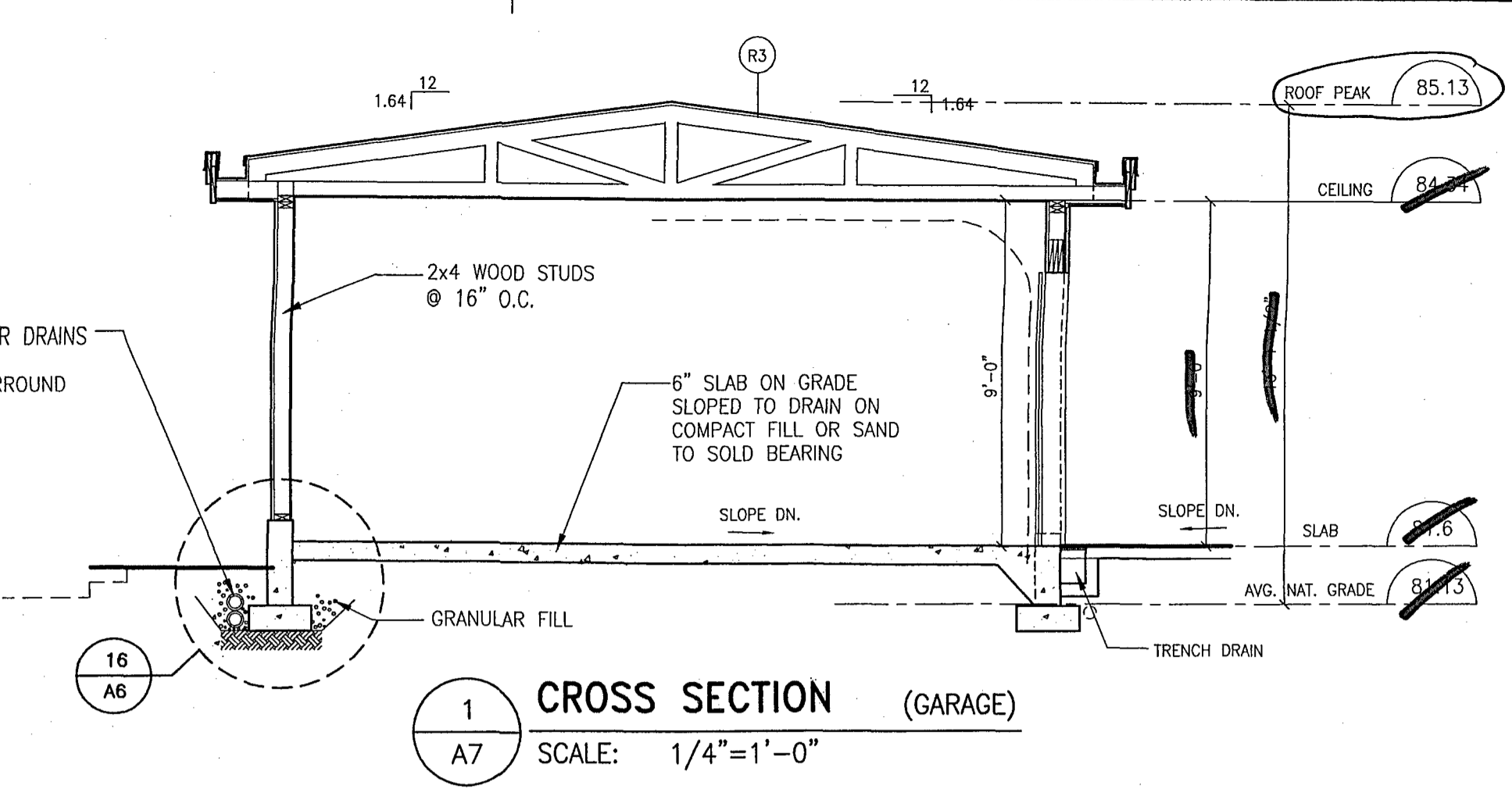
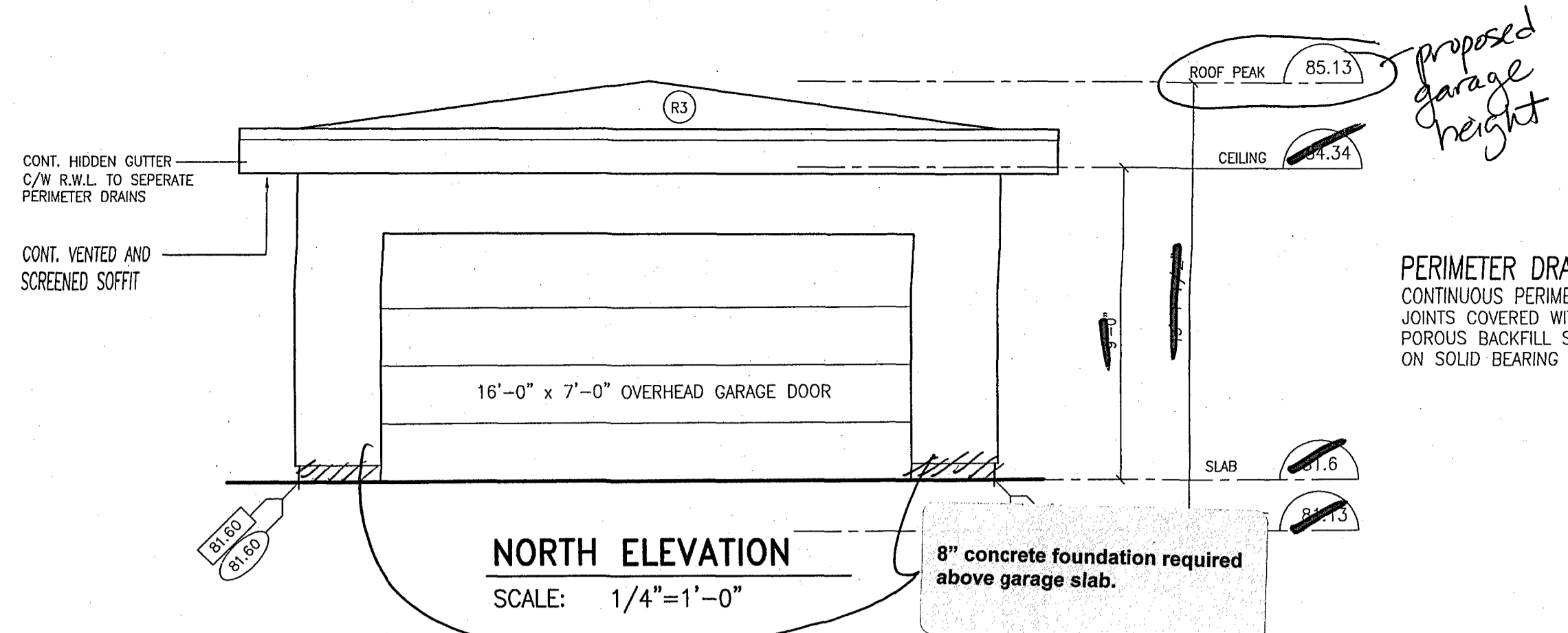
6. BUILDING PAPER INSTALLATION



7. BUILDING PAPER INSTALLATION/  
STRAP VENTING SILL

6 WALL/ WINDOW INSTALLATION SEQUENCE  
SCALE: NTS





**FLOOR PLAN (GARAGE)** 451 S.F.  
SCALE: 1/4"=1'-0"



**CDS**  
**CHEN DESIGN STUDIO LTD.**  
3228-8700 McKim Way,  
Richmond, BC V7X 4A5  
Tel. (604) 275-8882  
Fax (604) 909-1736

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Date:	Issued For:
A	A DETAIL NUMBER
B	B LOCATION SHEET
C	C DETAIL SHEET

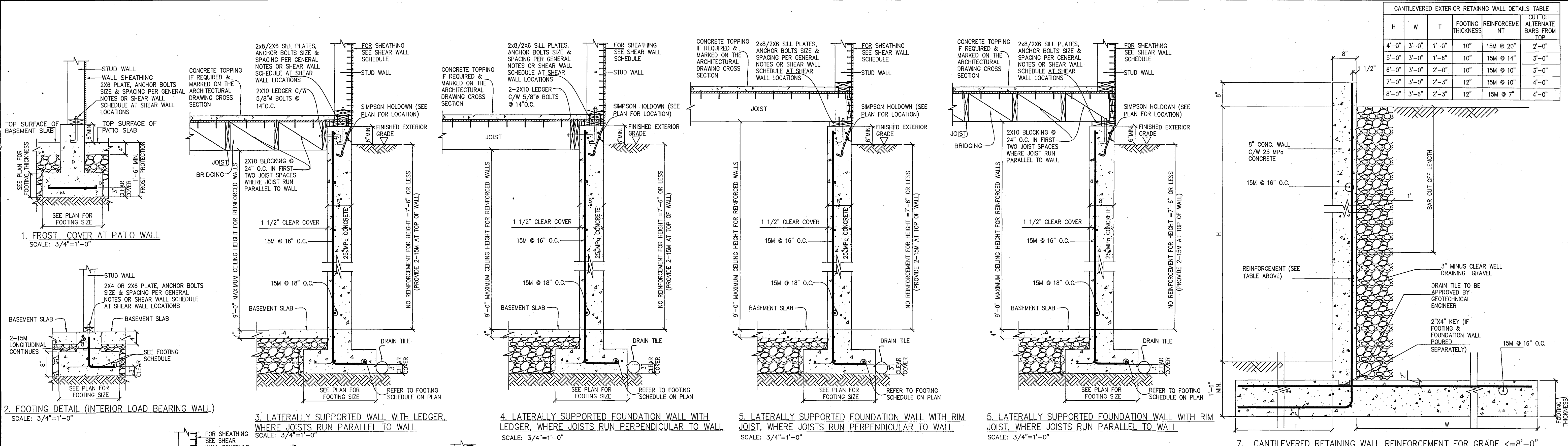
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Project:  
**14423 Blackburn Cres. White Rock, B.C.**  
14423 Blackburn Cres. White Rock, B.C.

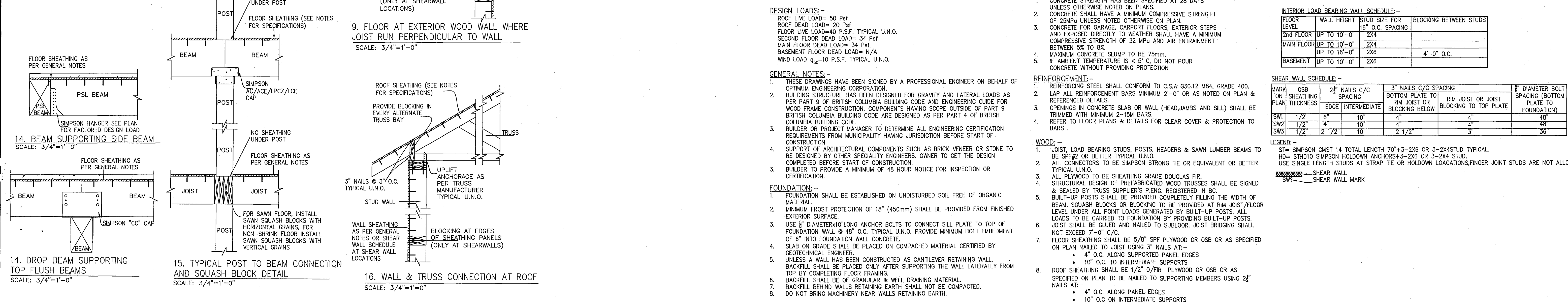
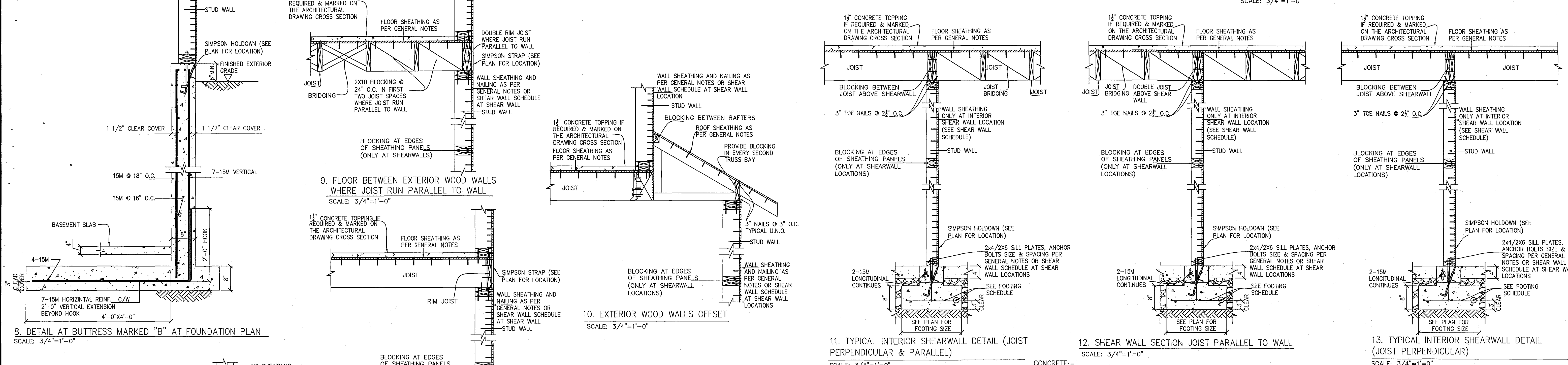
Drawing Title:  
**GARAGE FLOOR PLAN, ELEVATIONS & SECTION**

Date:  
Scale:  
Drawn By:  
Checked By:  
Project No.:  
Drawing No.:





H	W	T	FOOTING THICKNESS	REINFORCEMENT	CUT OFF ALTERNATE BARS FROM TOP
4'-0"	3'-0"	1'-0"	10"	15M @ 20"	2'-0"
5'-0"	3'-0"	1'-6"	10"	15M @ 14"	3'-0"
6'-0"	3'-0"	2'-0"	10"	15M @ 10"	3'-0"
7'-0"	3'-0"	2'-3"	12"	15M @ 10"	4'-0"
8'-0"	3'-6"	2'-3"	12"	15M @ 7"	4'-0"



**DESIGN LOADS:-**  
 ROOF LIVE LOAD= 50 Psf  
 ROOF DEAD LOAD= 20 Psf  
 FLOOR LIVE LOAD=40 P.S.F. TYPICAL U.N.O.  
 SECOND FLOOR DEAD LOAD= 34 Psf  
 MAIN FLOOR DEAD LOAD= 34 Psf  
 BASEMENT FLOOR DEAD LOAD= N/A  
 WIND LOAD q<sub>w</sub>=10 P.S.F. TYPICAL U.N.O.

**GENERAL NOTES:-**  
 1. THESE DRAWINGS HAVE BEEN SIGNED BY A PROFESSIONAL ENGINEER ON BEHALF OF OPTIMUM ENGINEERING CORPORATION.  
 2. BUILDING STRUCTURE HAS BEEN DESIGNED FOR GRAVITY AND LATERAL LOADS AS PER PART 9 OF BRITISH COLUMBIA BUILDING CODE AND ENGINEERING GUIDE FOR WOOD FRAME CONSTRUCTION. COMPONENTS HAVING SCOPE OUTSIDE OF PART 9 BRITISH COLUMBIA BUILDING CODE ARE DESIGNED AS PER PART 4 OF BRITISH COLUMBIA BUILDING CODE.  
 3. BUILDER OR PROJECT MANAGER TO DETERMINE ALL ENGINEERING CERTIFICATION REQUIREMENTS FROM MUNICIPALITY HAVING JURISDICTION BEFORE START OF CONSTRUCTION.  
 4. SUPPORT OF ARCHITECTURAL COMPONENTS SUCH AS BRICK VENEER OR STONE TO BE DESIGNED BY OTHER SPECIALTY ENGINEERS. OWNER TO GET THE DESIGN COMPLETED BEFORE START OF CONSTRUCTION.  
 5. BUILDER TO PROVIDE A MINIMUM OF 48 HOUR NOTICE FOR INSPECTION OR CERTIFICATION.

**FOUNDATION:-**  
 1. FOUNDATION SHALL BE ESTABLISHED ON UNDISTURBED SOIL FREE OF ORGANIC MATERIAL.  
 2. MINIMUM FROST PROTECTION OF 18" (450mm) SHALL BE PROVIDED FROM FINISHED EXTERIOR SURFACE.  
 3. USE 8" DIAMETERx10'LONG ANCHOR BOLTS TO CONNECT SILL PLATE TO TOP OF FOUNDATION WALL @ 48" O.C. TYPICAL U.N.O. PROVIDE MINIMUM BOLT EMBEDMENT OF 6" INTO FOUNDATION WALL CONCRETE.  
 4. SLAB ON GRADE SHALL BE PLACED ON COMPACTED MATERIAL CERTIFIED BY GEOTECHNICAL ENGINEER.  
 5. UNLESS A WALL HAS BEEN CONSTRUCTED AS CANTILEVER RETAINING WALL, BACKFILL SHALL BE PLACED ONLY AFTER SUPPORTING THE WALL LATERALLY FROM TOP BY COMPLETING FLOOR FRAMING.  
 6. BACKFILL SHALL BE OF GRANULAR & WELL DRAINING MATERIAL.  
 7. BACKFILL BEHIND WALLS RETAINING EARTH SHALL NOT BE COMPACTED.  
 8. DO NOT BRING MACHINERY NEAR WALLS RETAINING EARTH.

**CONCRETE:-**  
 1. CONCRETE STRENGTH HAS BEEN SPECIFIED AT 28 DAYS UNLESS OTHERWISE NOTED ON PLANS.  
 2. CONCRETE SHALL HAVE A MINIMUM COMPRESSIVE STRENGTH OF 25MPa UNLESS NOTED OTHERWISE ON PLAN.  
 3. CONCRETE FOR GARAGE, CARPORT FLOORS, EXTERIOR STEPS AND EXPOSED DIRECTLY TO WEATHER SHALL HAVE A MINIMUM COMPRESSIVE STRENGTH OF 32 MPa AND AIR ENTRAINMENT BETWEEN 5% TO 8%.  
 4. MAXIMUM CONCRETE SLUMP TO BE 75mm.  
 5. IF AMBIENT TEMPERATURE IS < 5° C, DO NOT POUR CONCRETE WITHOUT PROVIDING PROTECTION

**REINFORCEMENT:-**  
 1. REINFORCING STEEL SHALL CONFORM TO C.S.A G30.12 M84, GRADE 400.  
 2. LAP ALL REINFORCEMENT BARS MINIMUM 2'-0" OR AS NOTED ON PLAN & REFERENCED DETAILS.  
 3. OPENINGS IN CONCRETE SLAB OR WALL (HEAD, JAMBS AND SILL) SHALL BE TRIMMED WITH MINIMUM 2-15M BARS.  
 4. REFER TO FLOOR PLANS & DETAILS FOR CLEAR COVER & PROTECTION TO BARS.

**WOOD:-**  
 1. JOIST, LOAD BEARING STUDS, POSTS, HEADERS & SAWN LUMBER BEAMS TO BE SPF2 OR BETTER TYPICAL U.N.O.  
 2. ALL CONNECTORS TO BE SIMPSON STRONG TIE OR EQUIVALENT OR BETTER TYPICAL U.N.O.  
 3. ALL PLYWOOD TO BE SHEATHING GRADE DOUGLAS FIR.  
 4. STRUCTURAL DESIGN OF PREFABRICATED WOOD TRUSSES SHALL BE SIGNED & SEALED BY TRUSS SUPPLIER'S P.E.N.G. REGISTERED IN BC.  
 5. BUILT-UP POSTS SHALL BE PROVIDED COMPLETELY FILLING THE WIDTH OF BEAM. SQUASH BLOCKS OR BLOCKING TO BE PROVIDED AT RIM JOIST/FLOOR LEVEL UNDER ALL POINT LOADS GENERATED BY BUILT-UP POSTS. ALL LOADS TO BE CARRIED TO FOUNDATION BY PROVIDING BUILT-UP POSTS.  
 6. JOIST SHALL BE GLUED AND NAILED TO SUBFLOOR. JOIST BRIDGING SHALL NOT EXCEED 7'-0" C/C.  
 7. FLOOR SHEATHING SHALL BE 5/8" SPF PLYWOOD OR OSB OR AS SPECIFIED ON PLAN NAILED TO JOIST USING 3" NAILS AT:-  
 • 4" O.C. ALONG SUPPORTED PANEL EDGES  
 • 10" O.C. TO INTERMEDIATE SUPPORTS  
 8. ROOF SHEATHING SHALL BE 1/2" D/FIR PLYWOOD OR OSB OR AS SPECIFIED ON PLAN TO BE NAILED TO SUPPORTING MEMBERS USING 2 1/2" NAILS AT:-  
 • 4" O.C. ALONG PANEL EDGES  
 • 10" O.C. ON INTERMEDIATE SUPPORTS

**INTERIOR LOAD BEARING WALL SCHEDULE:-**

FLOOR LEVEL	WALL HEIGHT	STUD SIZE FOR 16" O.C. SPACING	BLOCKING BETWEEN STUDS
2nd FLOOR UP TO 10'-0"		2X4	
MAIN FLOOR UP TO 10'-0"		2X4	
UP TO 16'-0"		2X6	4'-0" O.C.
BASEMENT UP TO 10'-0"		2X6	

**SHEAR WALL SCHEDULE:-**

MARK ON SHEATHING THICKNESS	OSB SHEATHING	2 1/2" NAILS C/C SPACING	3" NAILS C/C SPACING	3" NAILS C/C SPACING	8" DIAMETER BOLT SPACING (BOTTOM PLATE TO FOUNDATION)	8" DIAMETER BOLT SPACING (TOP PLATE)
SW1	1/2"	6"	10"	4"	4"	48"
SW2	1/2"	4"	10"	4"	4"	48"
SW3	1/2"	2 1/2"	10"	2 1/2"	3"	36"

**LEGEND:-**  
 ST= SIMPSON CMST 14 TOTAL LENGTH 70"x3-2X6 OR 3-2X4 STUD TYPICAL.  
 HD= STD10 SIMPSON HOLDOWN ANCHORS-3-2X6 OR 3-2X4 STUD.  
 USE SINGLE LENGTH STUDS AT STRAP TIE OR HOLDOWN LOCATIONS, FINGER JOINT STUDS ARE NOT ALLOWED.  
 SW= SHEAR WALL MARK

ISSUED FOR BUILDING PERMIT

11-MAR-2013

REVISION DATE

REVISION DESCRIPTION

OPTIMUM ENGINEERING CORP.

#127, 13714-67 AVENUE, SURREY, BC V3W 6X6  
 PHONE: (604) 700-8153  
 FAX: (604) 543-4035

ARCHITECT

PROJECT TITLE

SINGLE FAMILY DWELLING & DETACHED GARAGE

PROJECT ADDRESS

14423-Blackburn Crescent White Rock, BC.

STAMP

DRAWN: DS

DRAWING CONTENTS

TYPICAL STRUCTURAL DETAILS

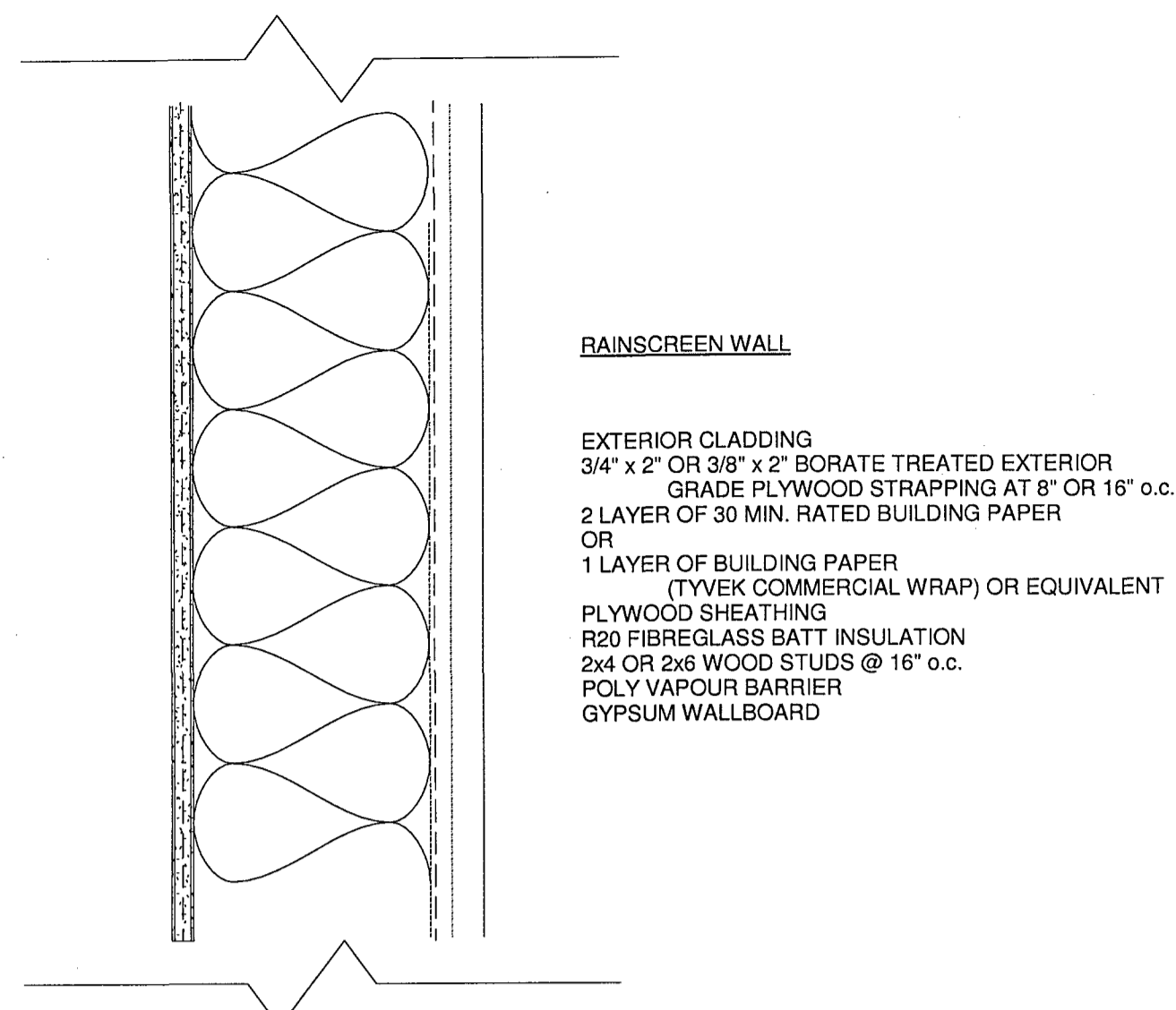
PROJECT NO

RACCOG

DRAWING NO

S1

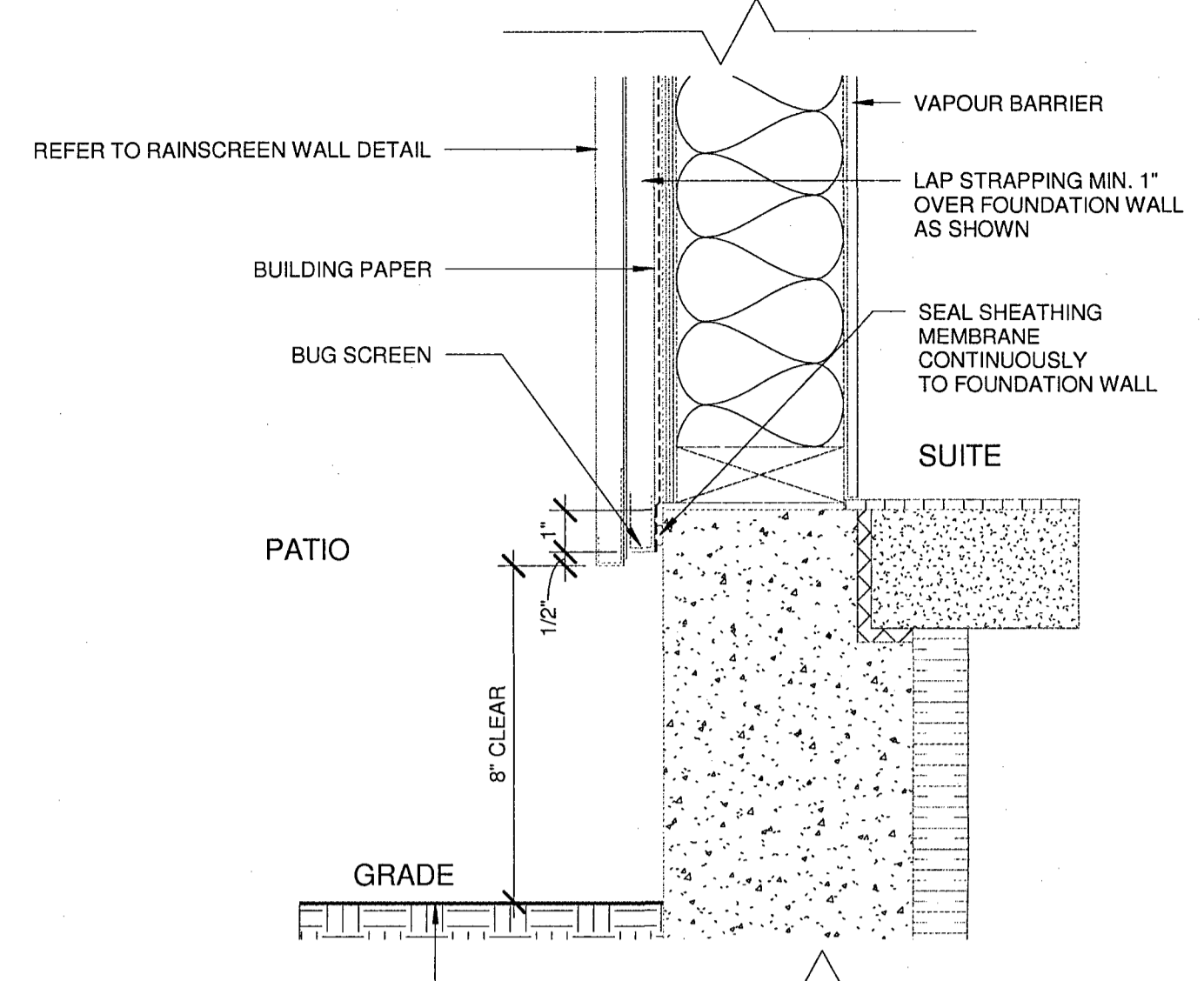




**RAINSCREEN WALL**

EXTERIOR CLADDING  
 3/4" x 2" OR 3/8" x 2" BORATE TREATED EXTERIOR GRADE PLYWOOD STRAPPING AT 8" OR 16" o.c.  
 2 LAYER OF 30 MIN. RATED BUILDING PAPER  
 OR  
 1 LAYER OF BUILDING PAPER (TYVEK COMMERCIAL WRAP) OR EQUIVALENT PLYWOOD SHEATHING  
 F20 FIBREGLASS BATT INSULATION  
 2x4 OR 2x6 WOOD STUDS @ 16" o.c.  
 POLY VAPOUR BARRIER  
 GYPSUM WALLBOARD

TYPICAL EXTERIOR WALL (DETAIL #CA1)



REFER TO RAINSCREEN WALL DETAIL

VAPOUR BARRIER

LAP STRAPPING MIN. 1" OVER FOUNDATION WALL AS SHOWN

BUILDING PAPER

BUG SCREEN

SEAL SHEATHING MEMBRANE CONTINUOUSLY TO FOUNDATION WALL

SUITE

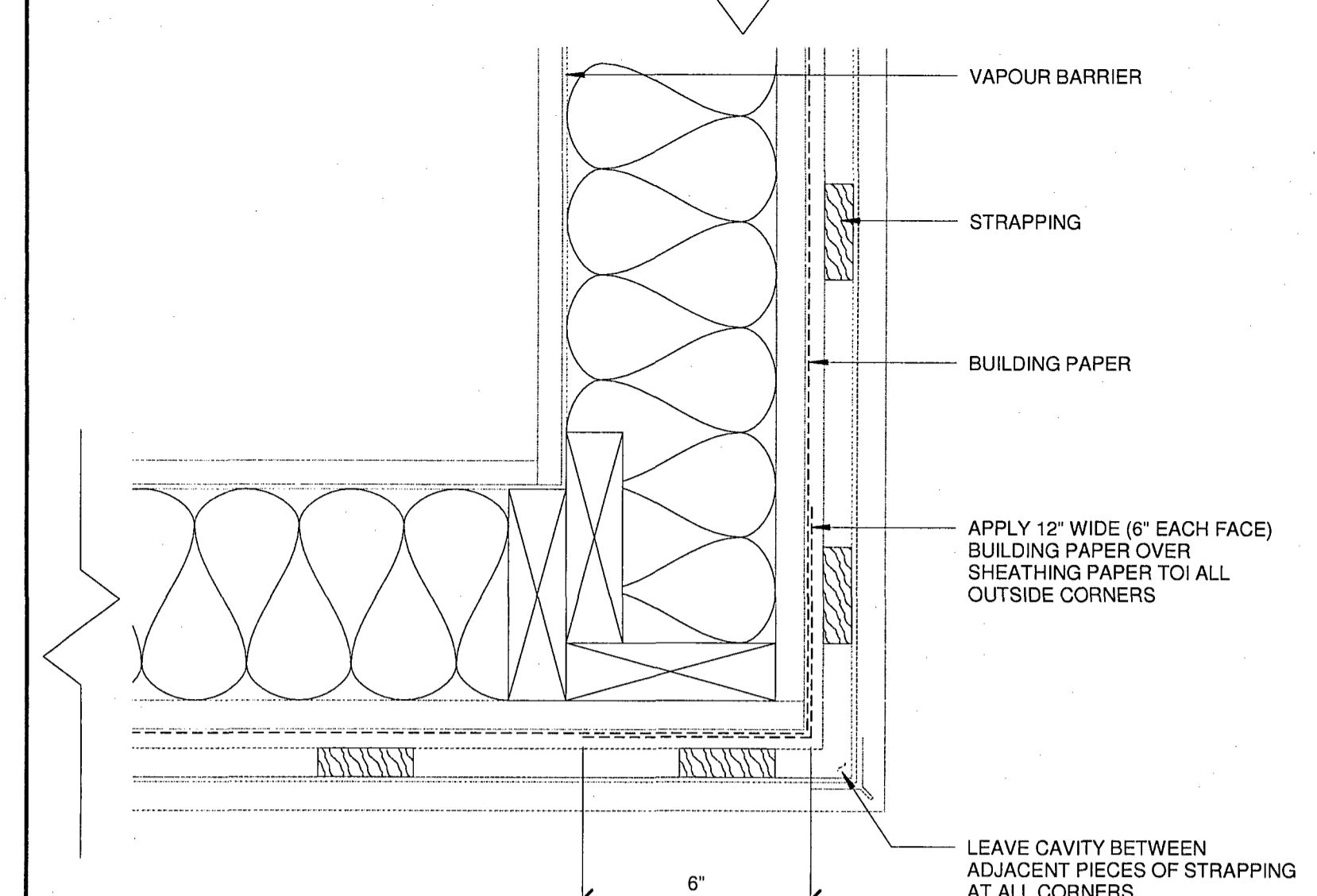
PATIO

8" CLEAR

GRADE

PROVIDE MIN. 8" VERTICAL CLEARANCE

FOUNDATION AT RAINSCREEN WALL



VAPOUR BARRIER

STRAPPING

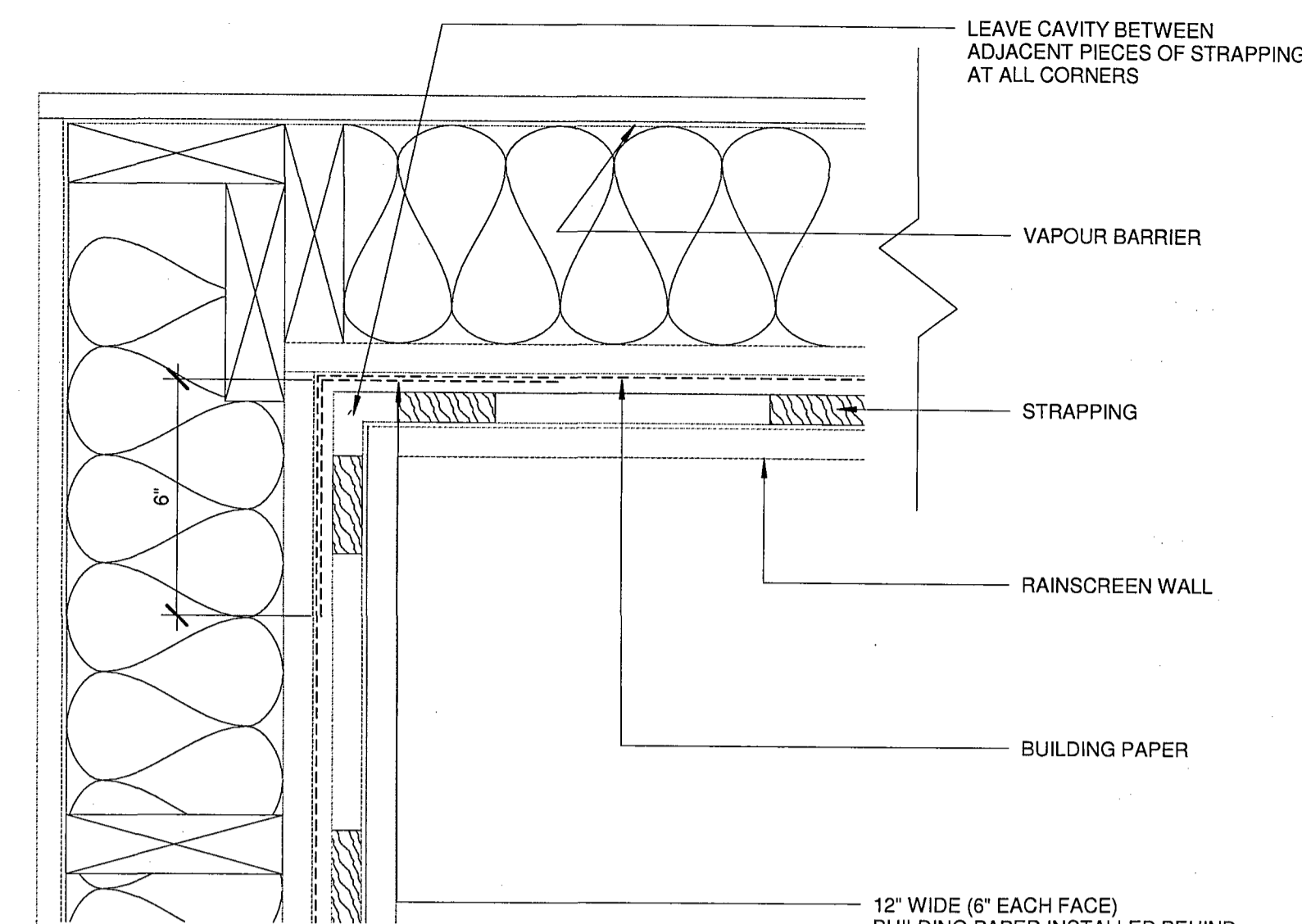
BUILDING PAPER

APPLY 12" WIDE (6" EACH FACE) BUILDING PAPER OVER SHEATHING PAPER TO ALL OUTSIDE CORNERS

6"

LEAVE CAVITY BETWEEN ADJACENT PIECES OF STRAPPING AT ALL CORNERS

TYPICAL OUTSIDE CORNER



LEAVE CAVITY BETWEEN ADJACENT PIECES OF STRAPPING AT ALL CORNERS

VAPOUR BARRIER

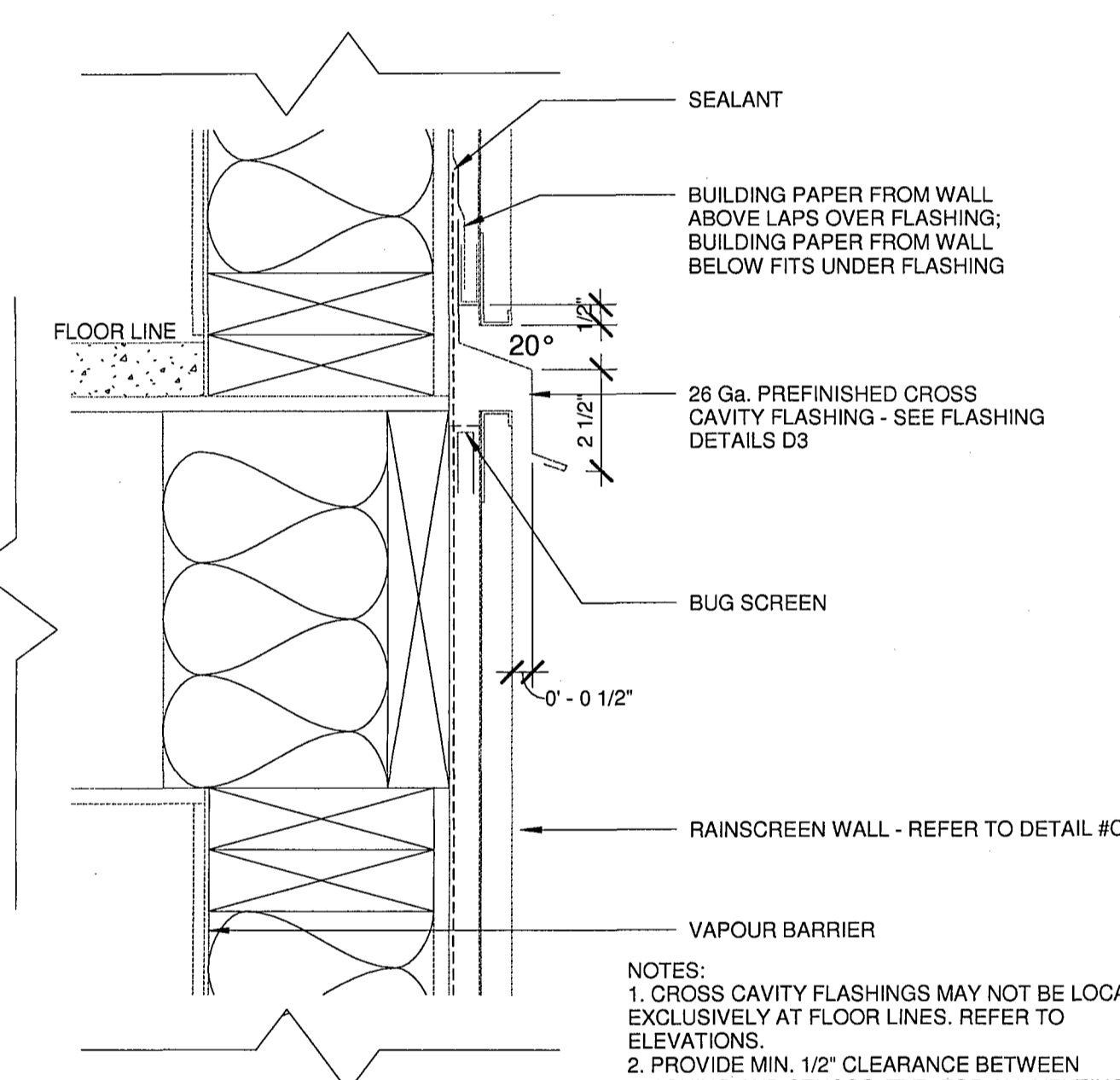
STRAPPING

RAINSCREEN WALL

BUILDING PAPER

12" WIDE (6" EACH FACE) BUILDING PAPER INSTALLED BEHIND CROSS CAVITY FLASHING (AT ALL INSIDE CORNERS)

TYPICAL INSIDE CORNER



SEALANT

BUILDING PAPER FROM WALL ABOVE LAPS OVER FLASHING; BUILDING PAPER FROM WALL BELOW FITS UNDER FLASHING

FLOOR LINE

20°

26 Ga. PRE-FINISHED CROSS CAVITY FLASHING - SEE FLASHING DETAILS D3

BUG SCREEN

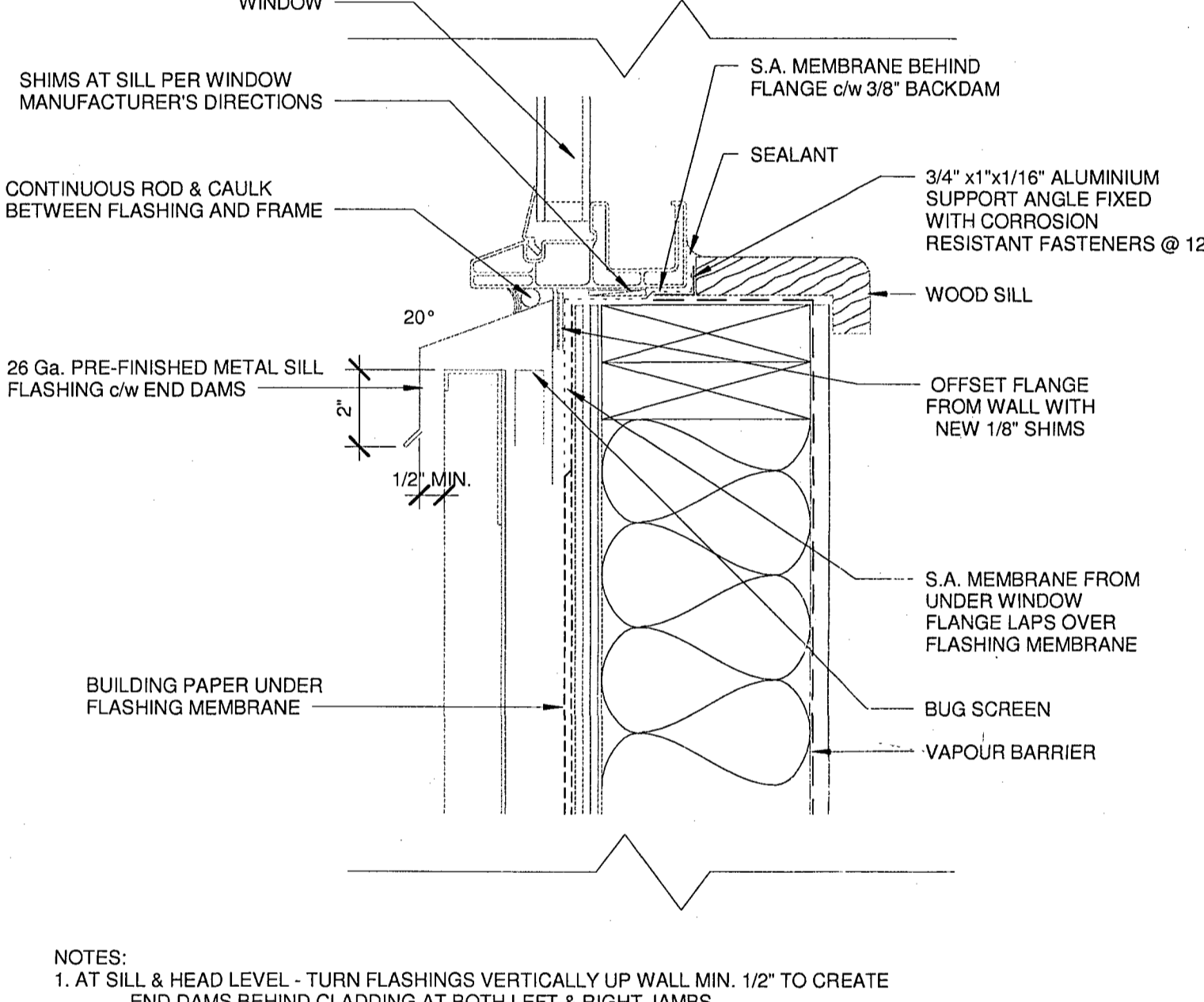
0" - 0 1/2"

RAINSCREEN WALL - REFER TO DETAIL #CA1

VAPOUR BARRIER

NOTES:  
 1. CROSS CAVITY FLASHINGS MAY NOT BE LOCATED EXCLUSIVELY AT FLOOR LINES. REFER TO ELEVATIONS.  
 2. PROVIDE MIN. 1/2" CLEARANCE BETWEEN FLASHING AND STUCCO (TYP. FOR ALL VENTING LOCATIONS).

CROSS CAVITY FLASHING



WINDOW

SHIMS AT SILL PER WINDOW MANUFACTURER'S DIRECTIONS

S.A. MEMBRANE BEHIND FLANGE c/w 3/8" BACKDAM

SEALANT

3/4" x 1 1/16" ALUMINIUM SUPPORT ANGLE FIXED WITH CORROSION RESISTANT FASTENERS @ 12" o.c.

WOOD SILL

20°

26 Ga. PRE-FINISHED METAL SILL FLASHING c/w END DAMS

OFFSET FLANGE FROM WALL WITH NEW 1/8" SHIMS

S.A. MEMBRANE FROM UNDER WINDOW FLANGE LAPS OVER FLASHING MEMBRANE

BUILDING PAPER UNDER FLASHING MEMBRANE

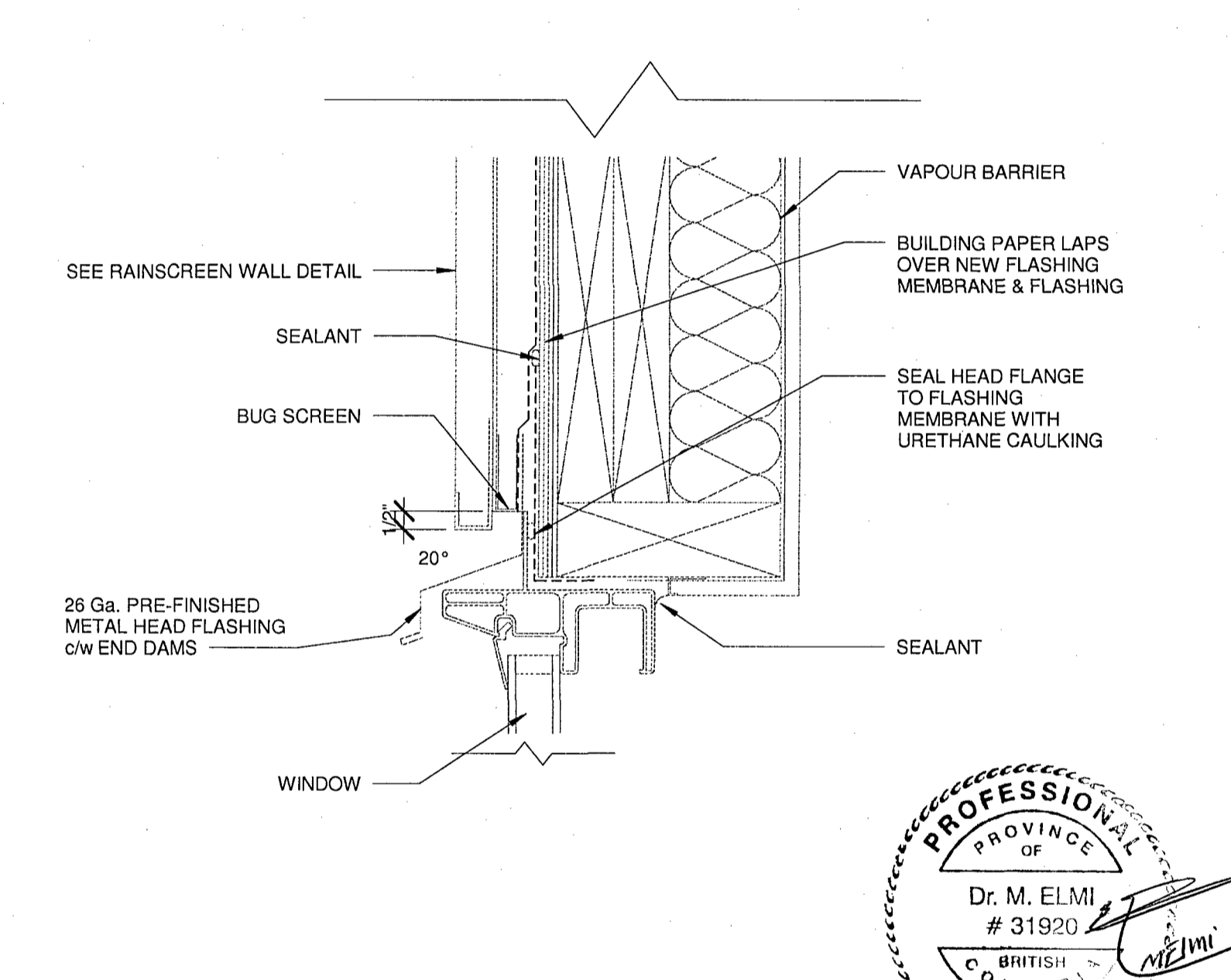
BUG SCREEN

VAPOUR BARRIER

1/2" MIN.

NOTES:  
 1. AT SILL & HEAD LEVEL - TURN FLASHINGS VERTICALLY UP WALL MIN. 1/2" TO CREATE END DAMS BEHIND CLADDING AT BOTH LEFT & RIGHT JAMBS.  
 2. REFER TO WINDOW WATERPROOFING SEQUENCE D2

WINDOW SILL



SEE RAINSCREEN WALL DETAIL

SEALANT

BUG SCREEN

26 Ga. PRE-FINISHED METAL HEAD FLASHING c/w END DAMS

VAPOUR BARRIER

BUILDING PAPER LAPS OVER NEW FLASHING MEMBRANE & FLASHING

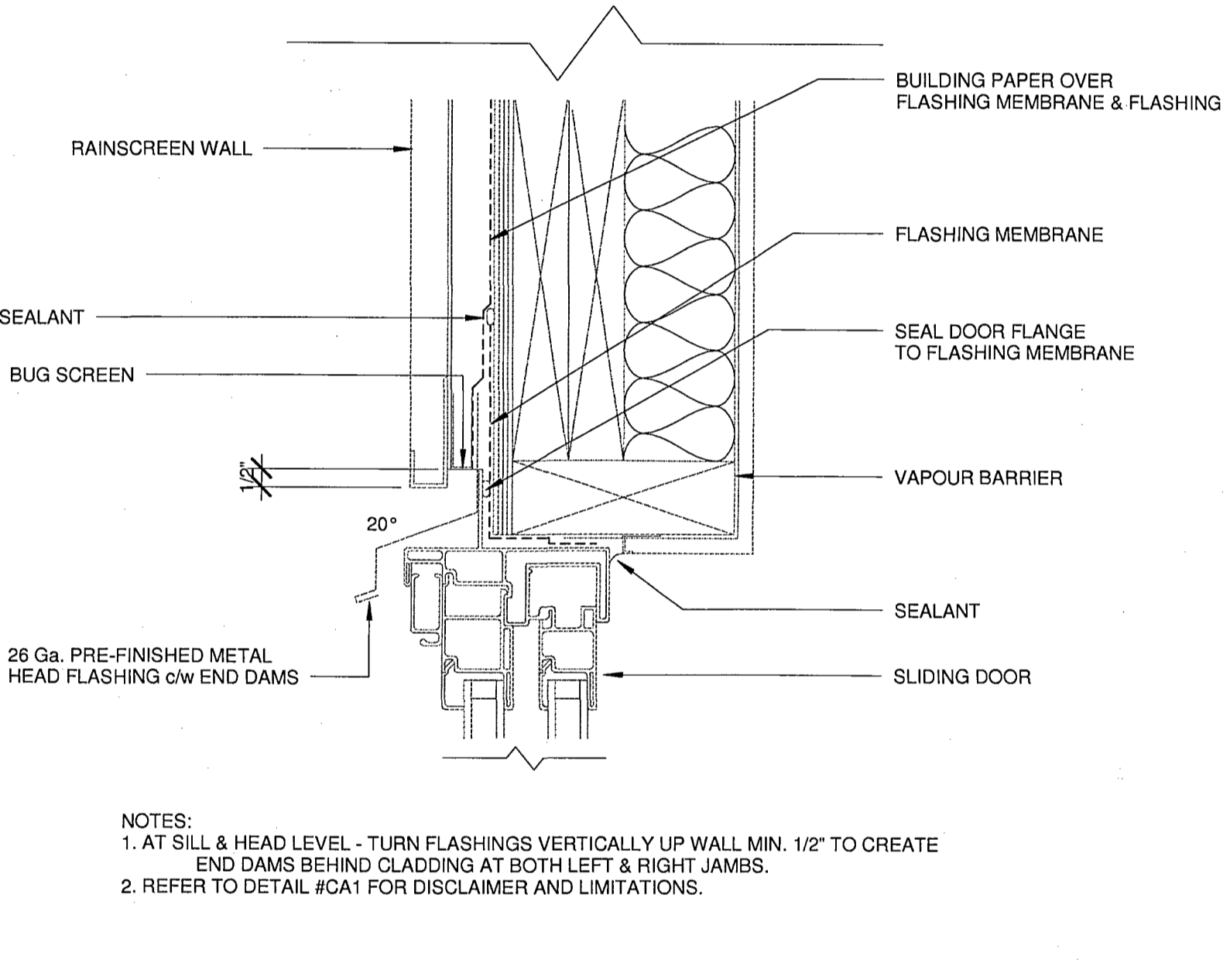
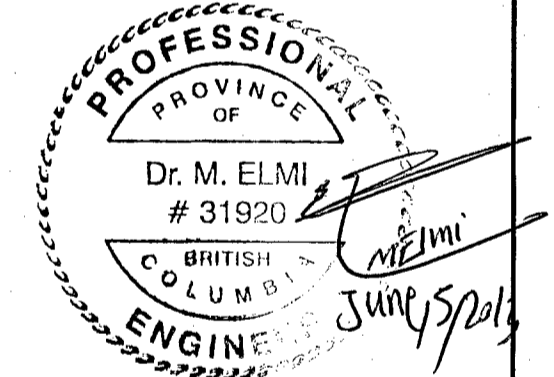
SEAL HEAD FLANGE TO FLASHING MEMBRANE WITH URETHANE CAULKING

20°

SEALANT

WINDOW

WINDOW HEAD



BUILDING PAPER OVER FLASHING MEMBRANE & FLASHING

FLASHING MEMBRANE

SEAL DOOR FLANGE TO FLASHING MEMBRANE

VAPOUR BARRIER

SEALANT

BUG SCREEN

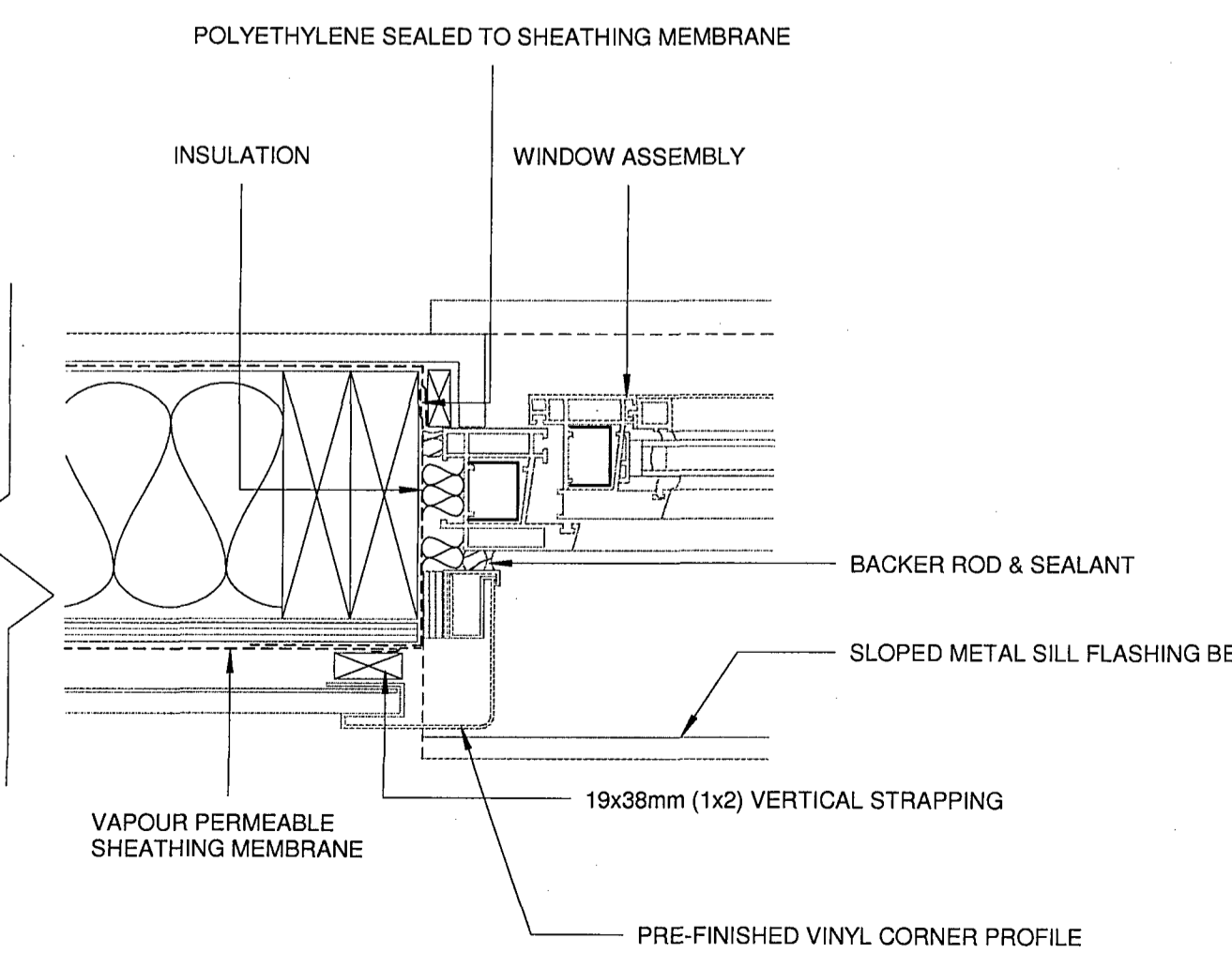
26 Ga. PRE-FINISHED METAL HEAD FLASHING c/w END DAMS

SLIDING DOOR

20°

NOTES:  
 1. AT SILL & HEAD LEVEL - TURN FLASHINGS VERTICALLY UP WALL MIN. 1/2" TO CREATE END DAMS BEHIND CLADDING AT BOTH LEFT & RIGHT JAMBS.  
 2. REFER TO DETAIL #CA1 FOR DISCLAIMER AND LIMITATIONS.

SLIDING DOOR - HEAD



POLYETHYLENE SEALED TO SHEATHING MEMBRANE

INSULATION

WINDOW ASSEMBLY

BACKER ROD & SEALANT

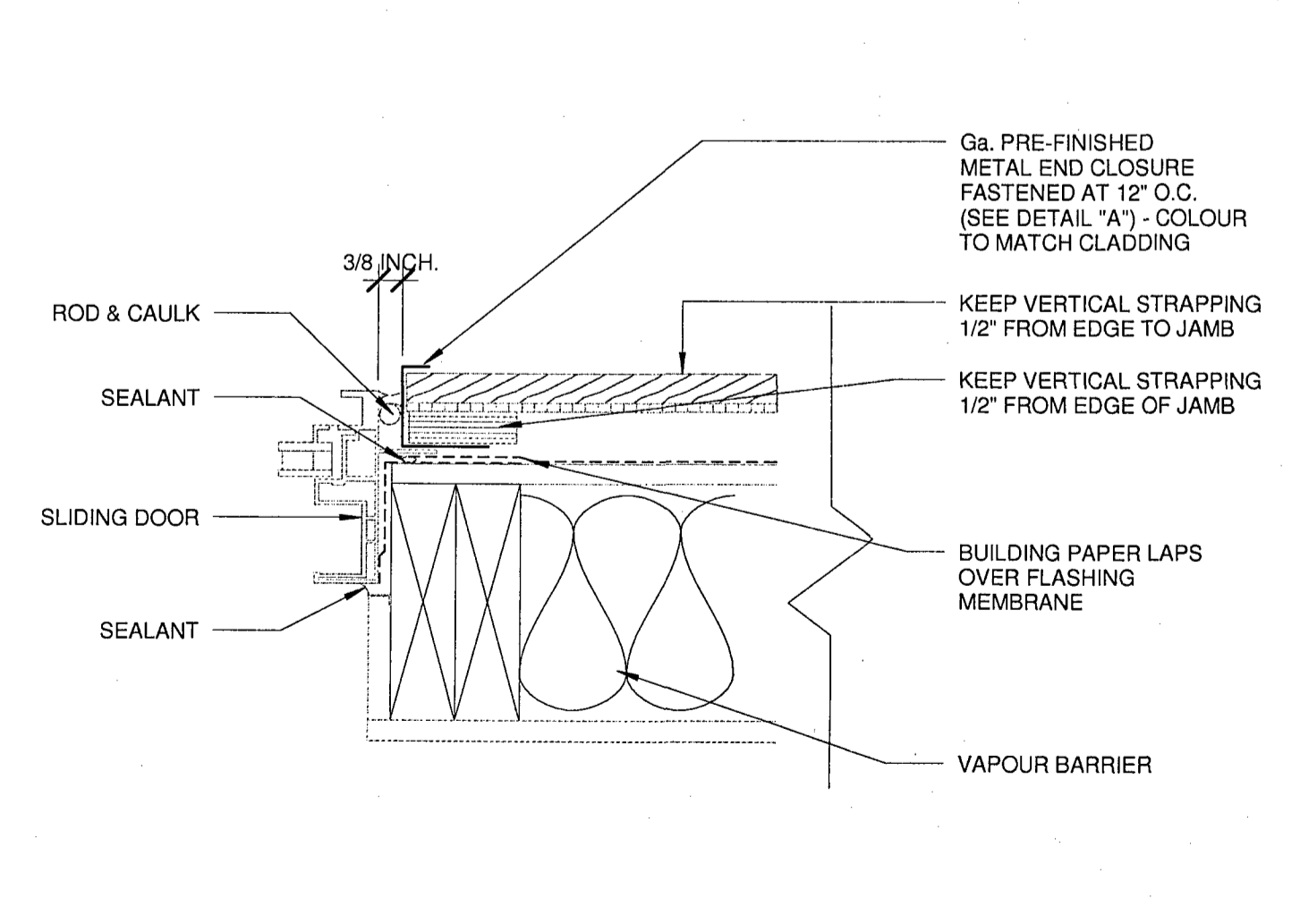
SLOPED METAL SILL FLASHING BELOW

VAPOUR PERMEABLE SHEATHING MEMBRANE

19x38mm (1x2) VERTICAL STRAPPING

PRE-FINISHED VINYL CORNER PROFILE

WINDOW JAMB



3/8 INCH

ROD & CAULK

SEALANT

SLIDING DOOR

SEALANT

Ga. PRE-FINISHED METAL END CLOSURE FASTENED AT 12" O.C. (SEE DETAIL #A1) - COLOUR TO MATCH CLADDING

KEEP VERTICAL STRAPPING 1/2" FROM EDGE TO JAMB

KEEP VERTICAL STRAPPING 1/2" FROM EDGE OF JAMB

BUILDING PAPER LAPS OVER FLASHING MEMBRANE

VAPOUR BARRIER

SLIDING DOOR - JAMB

**GENERAL NOTES AND SPECIFICATIONS**

- ALL CONSTRUCTION WORKS AND MATERIAL SUPPLIED SHALL BE IN CONFORMS TO THE GOVERNING "BRITISH COLUMBIA BUILDING CODE 2012" AND LOCAL JURISDICTION CODE AND BYLAWS.
- THE DRAWINGS SHALL BE READ IN CONJUNCTION WITH ARCHITECTURAL DRAWINGS.
- ALL NOTES AND SPECIFICATION, PLANS AND DETAILS SHALL BE READ AS ONE DOCUMENT.
- PRIOR TO THE CONSTRUCTION OR ORDERING THE MATERIAL, CONTRACTOR SHOULD CHECK AND VERIFY ALL DIMENSIONS, ELEVATIONS AND SPECIFICATION. ANY ERROR OR DISCREPANCIES IN THIS REGARD SHALL BE COMMUNICATED TO THE ENGINEER FOR CLARIFICATION.
- CLADDING AND RAIN SCREEN, SHOULD PROVIDE A LEVEL OF PERFORMANCE EQUIVALENT TO THAT REQUIRED IN BC BUILDING CODE 2012, PART 5, SENTENCES 5.6.1.1(1) AND 5.6.1.2(3) PART 9 ARTICLES 9.27.2.1 AND 9.20.2.1.
- THESE DETAILS MAY CHANGE AT SOME LOCATIONS, OR AS PER COMPLY WITH ARCHITECTURAL DRAWINGS.
- CONSIDERING MATERIAL COST AND INSTALLATION METHODS, OTHER PRODUCT AND DETAILS COULD BE CONSIDERED AND MUST BE OFFERED TO BEST WEST ENGINEERS LTD. FOR FINAL APPROVAL.
- THESE DETAILS EXCLUSIVELY HAVE BEEN PROVIDED FOR WOOD FRAME CONSTRUCTION.

**DISCLAIMER**

THE DRAWINGS AND TEXTS ARE INTENDED AS A GENERAL PRACTICE GUIDE ONLY AND REPRESENTS CURRENT WOOD FRAME BUILDING PRACTICES IN THE BRITISH COLUMBIA COASTAL REGION. THE READER IS TO EVALUATE THE INFORMATION, MATERIALS AND TECHNIQUES CAUTIOUSLY AND TO CONSULT APPROPRIATE PROFESSIONAL RESOURCES TO DETERMINE WHETHER THE INFORMATION, MATERIALS AND TECHNIQUES ARE SUITABLE IN EACH INSTANCE. PROJECT AND SITE-SPECIFIC FACTORS INCLUDING CLIMATE, COST, AESTHETICS, ETC., MUST BE TAKEN INTO CONSIDERATION.

Best West Engineers Ltd.  
 211-3030 LINCOLN AVENUE, COQUITLAM, B.C. V3B 6B4  
 EMAIL: INFO@BWEINGS.COM  
 PHONE: (604) 468 7304

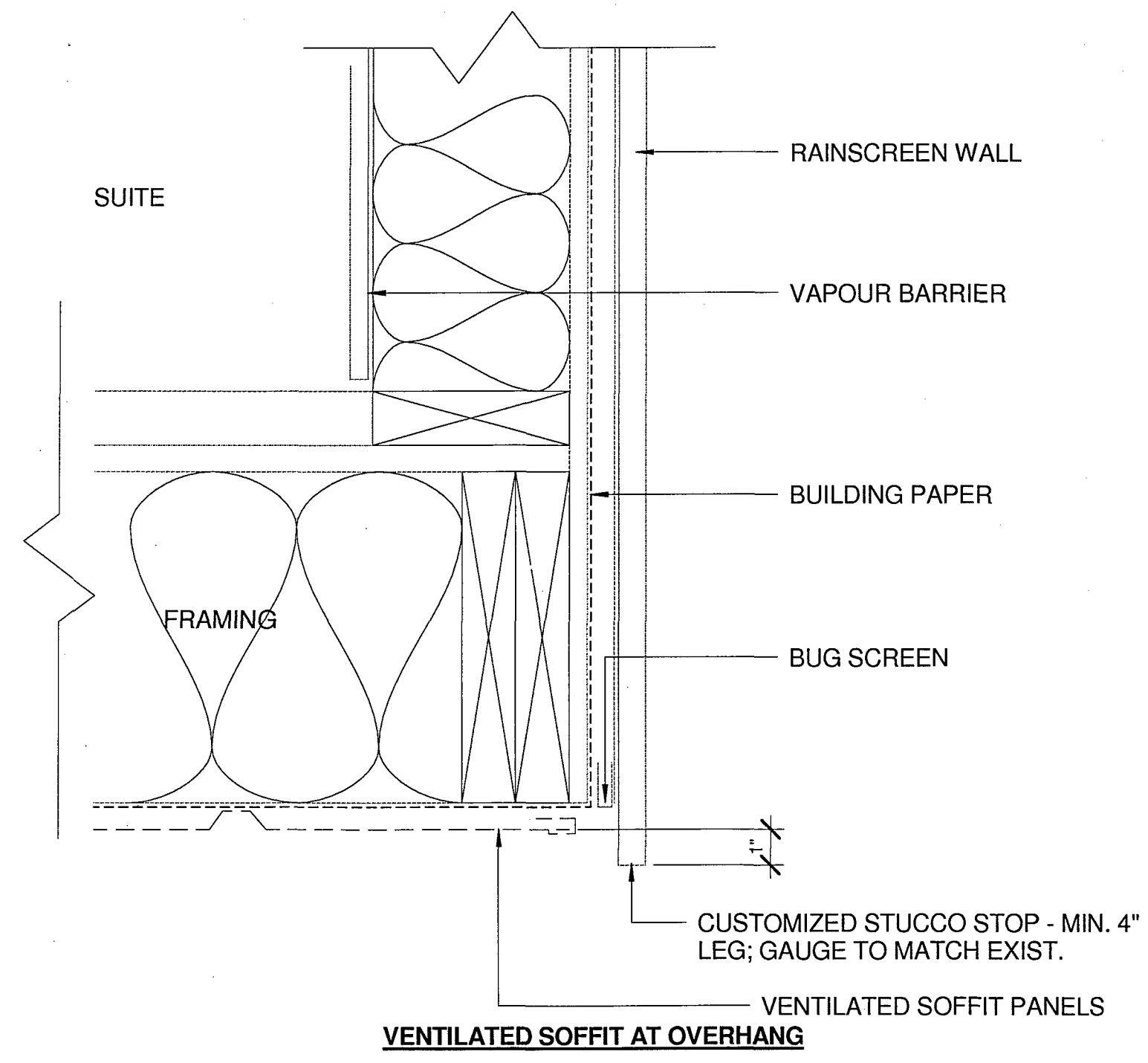
SCALE 3" = 1'-0"

**DETAIL 1**  
 14423 BLACKBURN CRESCENT, WHITEROCK, BC

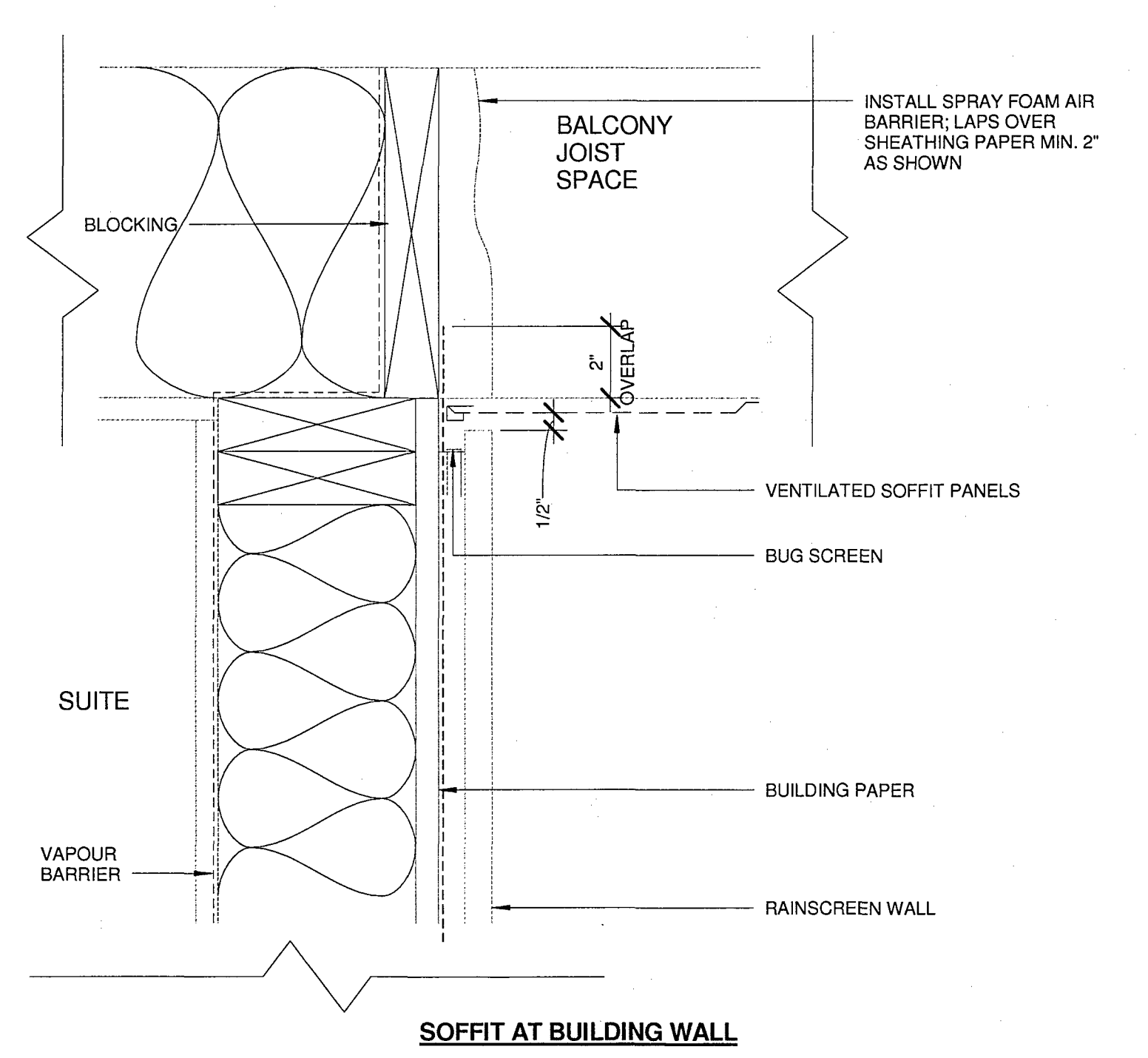
DRAWING TITLE

SHEET NUMBER

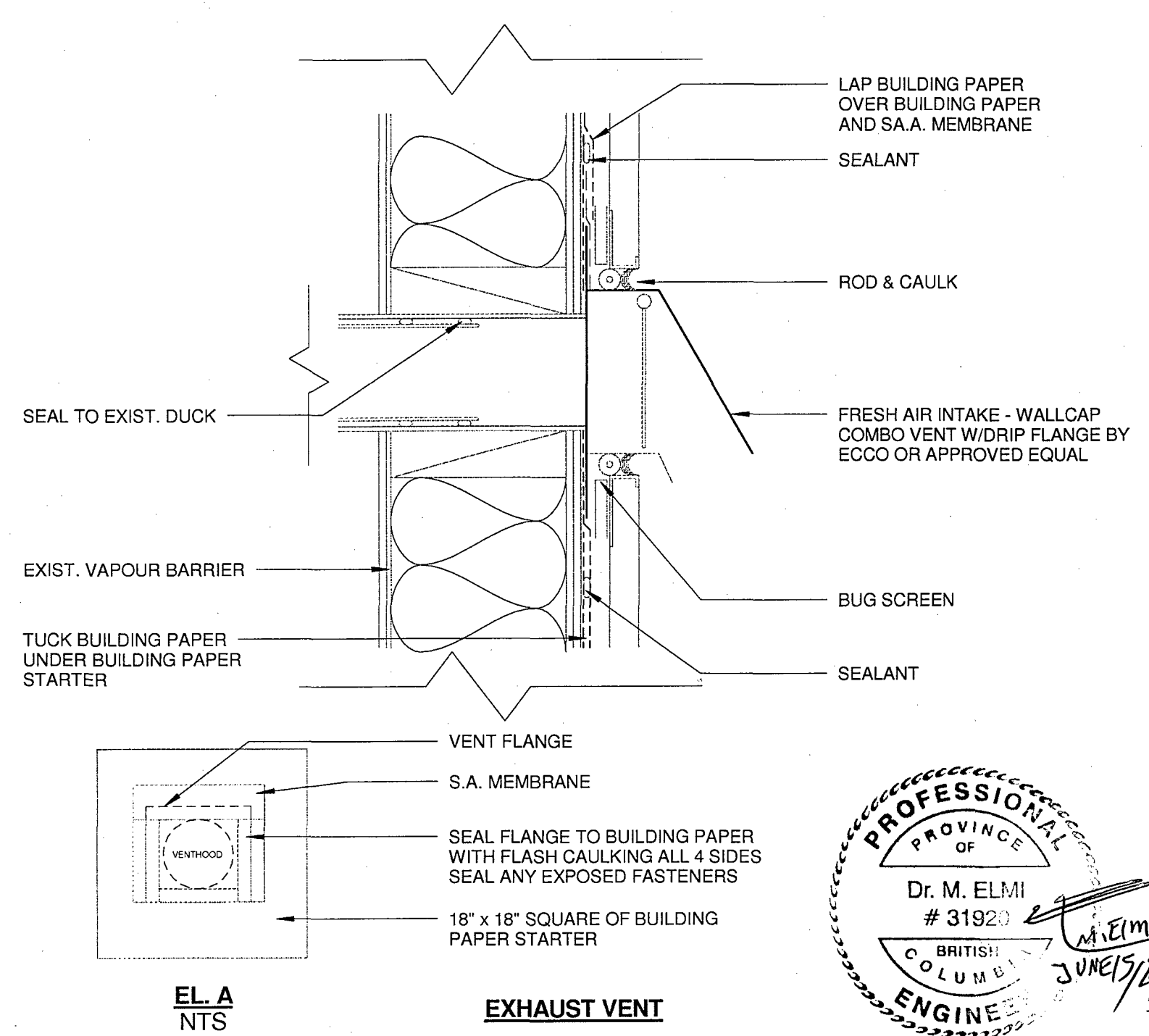
D1 REVISION 1



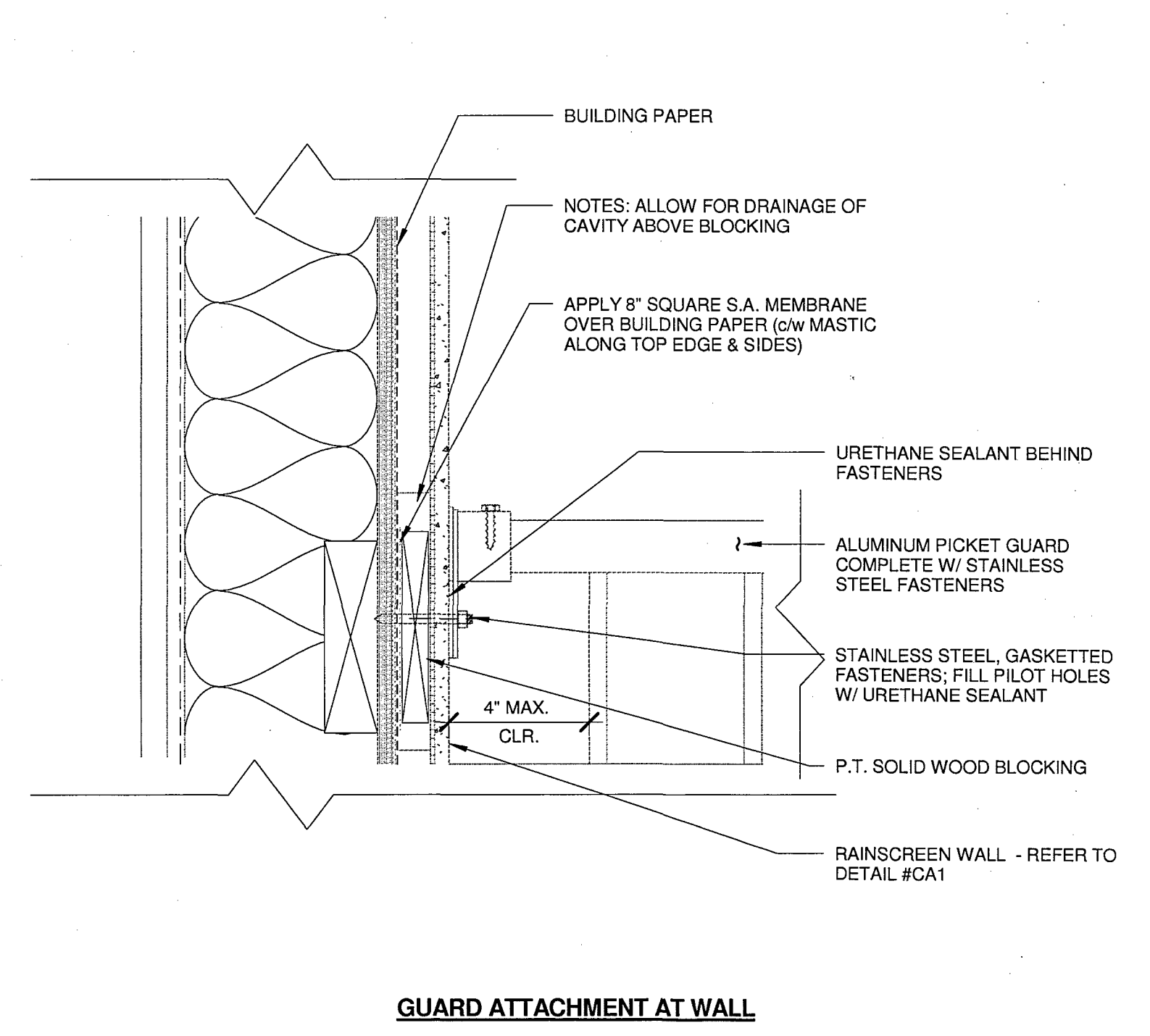
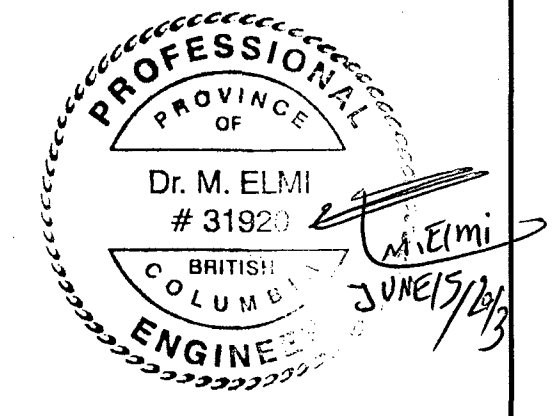
**VENTILATED SOFFIT AT OVERHANG**



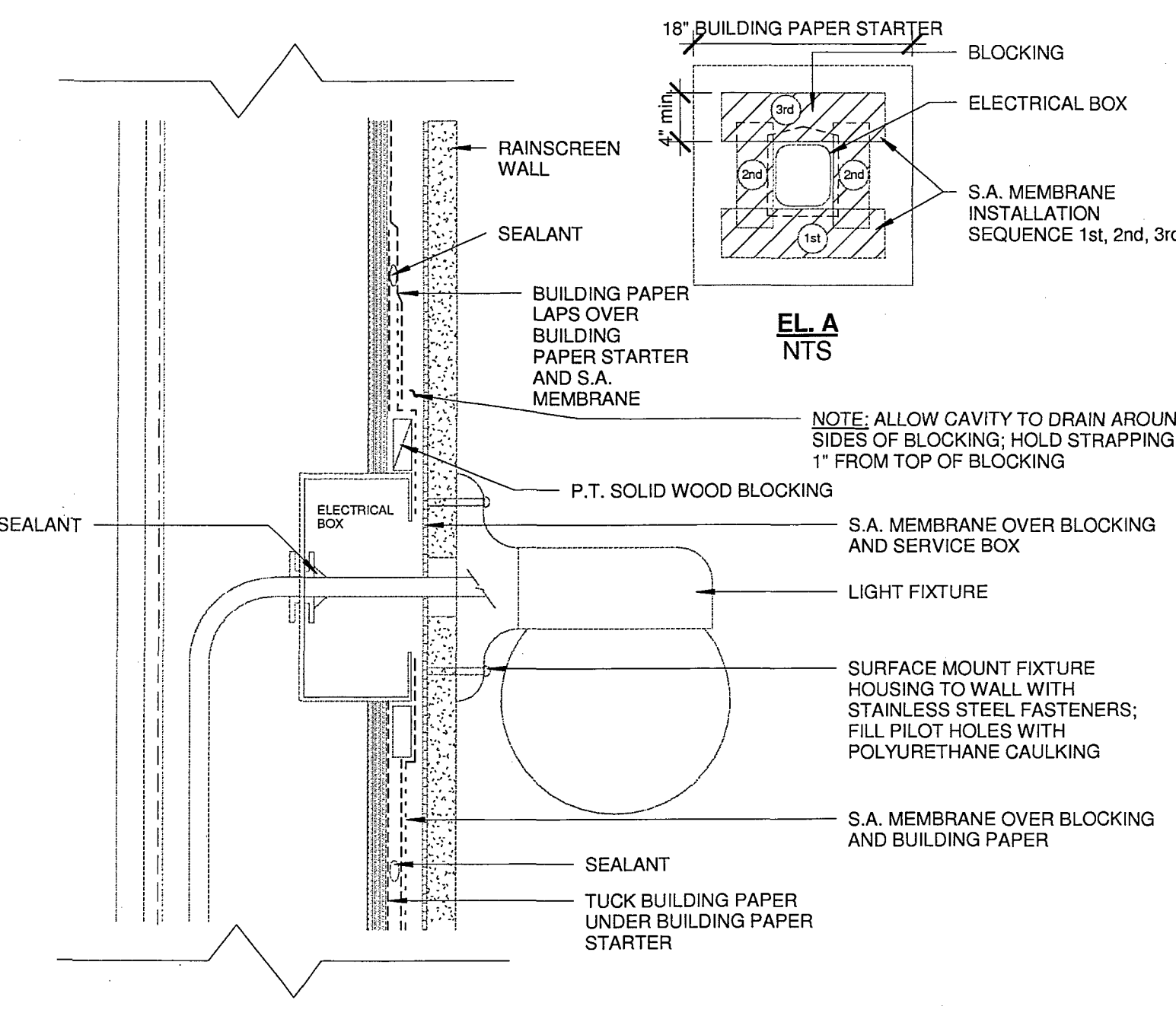
**SOFFIT AT BUILDING WALL**



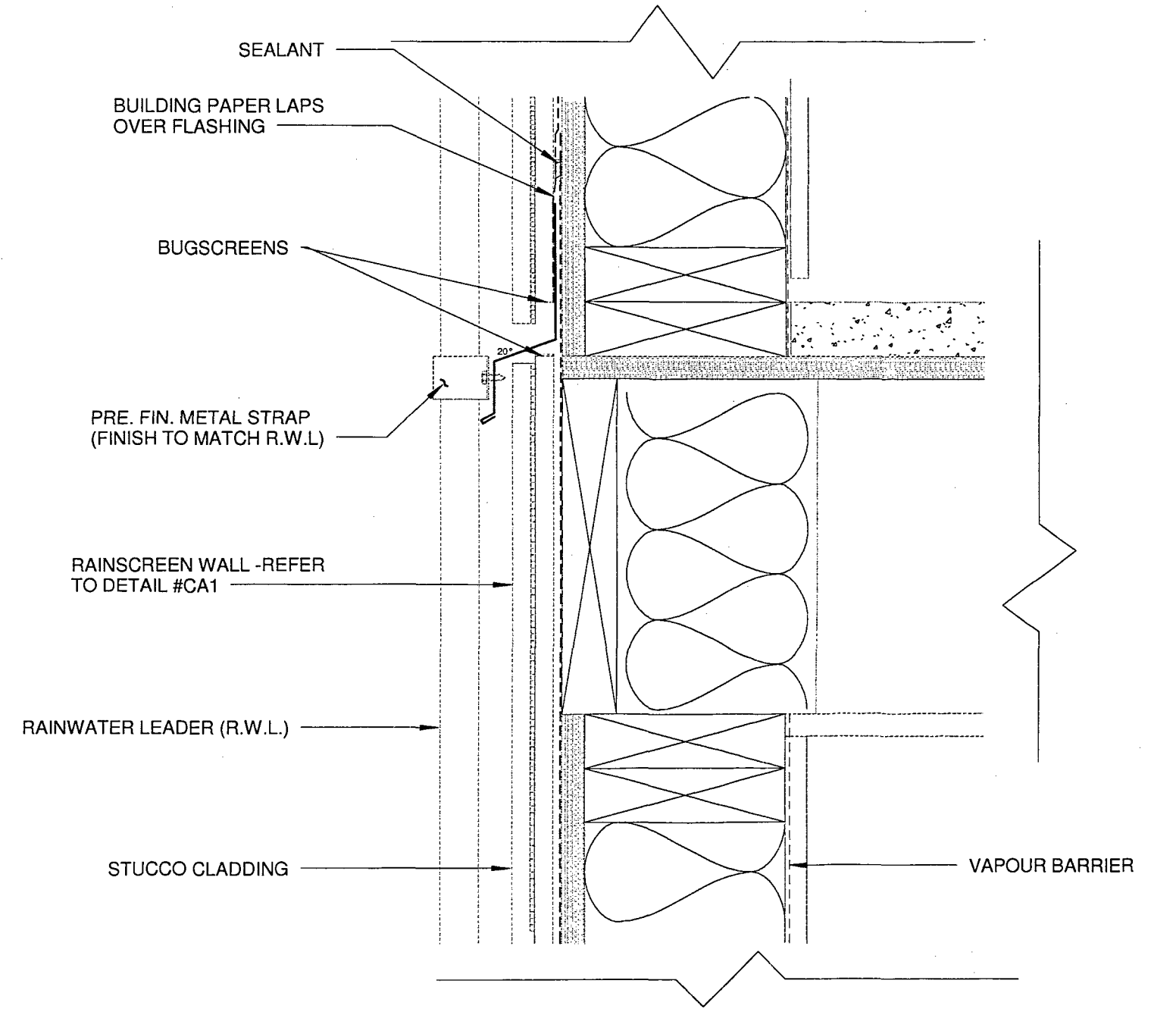
**EXHAUST VENT**



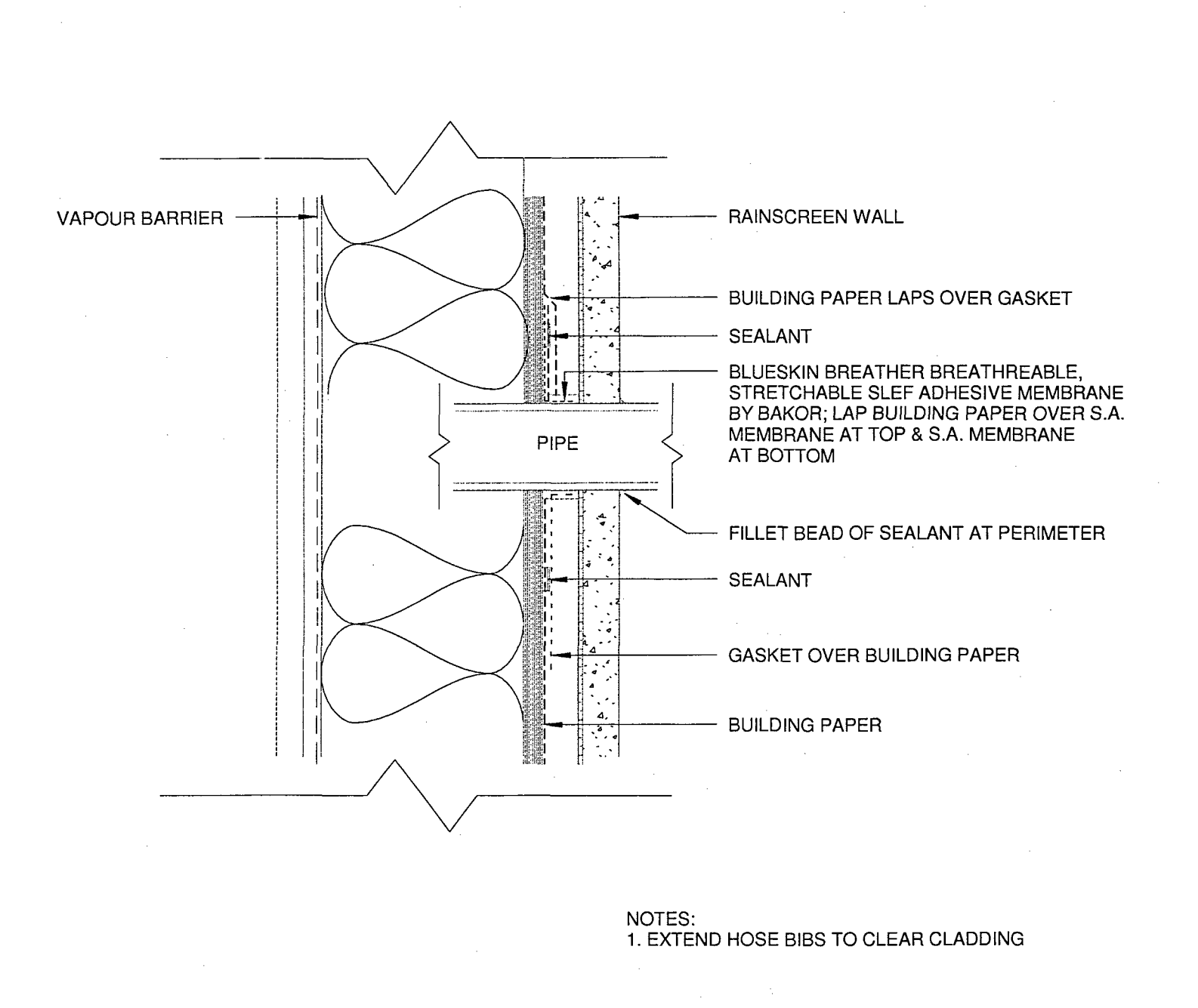
**GUARD ATTACHMENT AT WALL**



**ELECTRICAL BOX**



**R.W.L. ATTACHMENT**

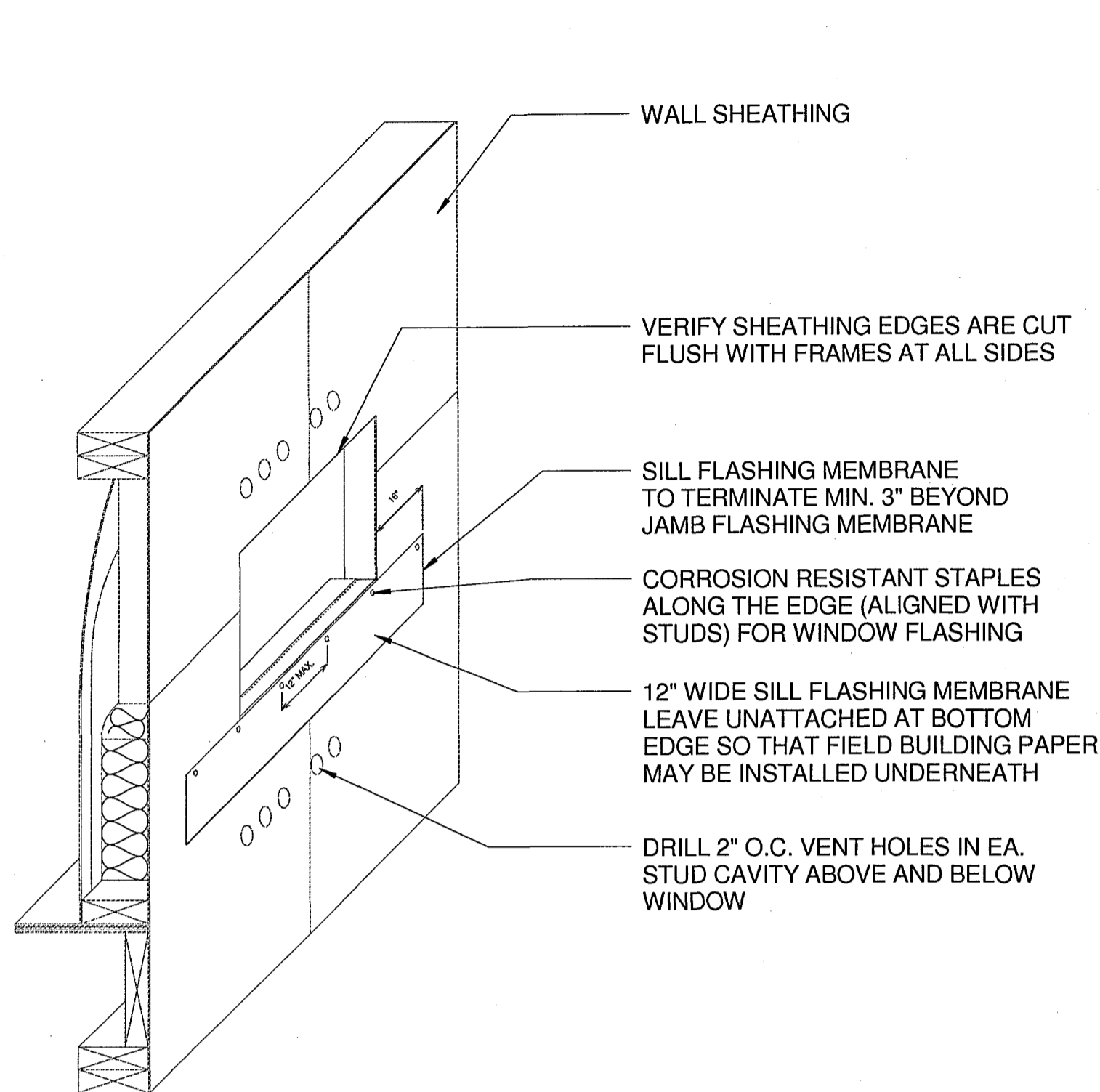


**PIPE PROTRUSION**

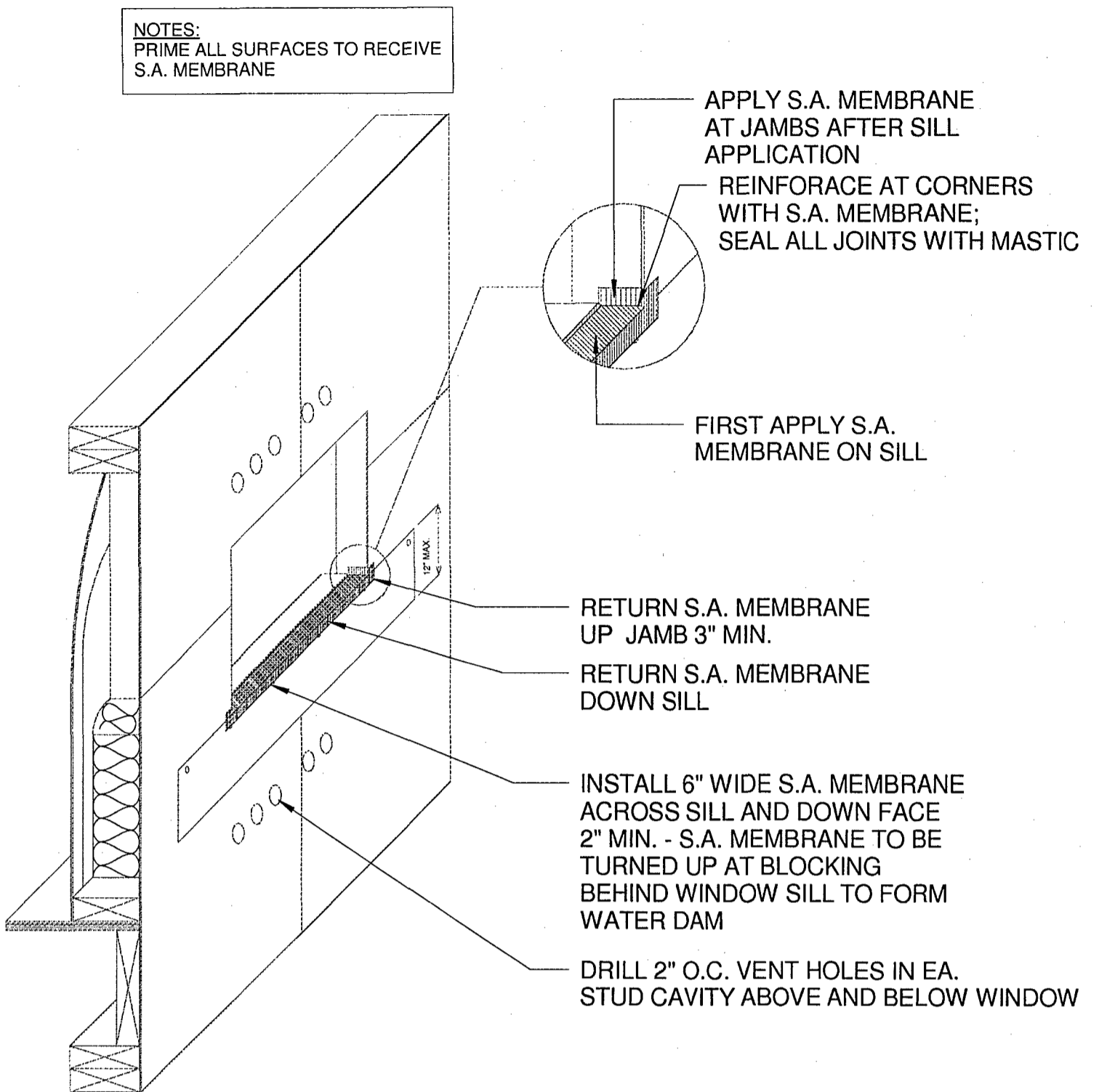


SCALE	Approver
<b>DETAIL 2</b>	
14423 BLACKBURN CRESCENT, WHITEROCK	
DRAWING TITLE	
SHEET NUMBER	D2 REVISION 1

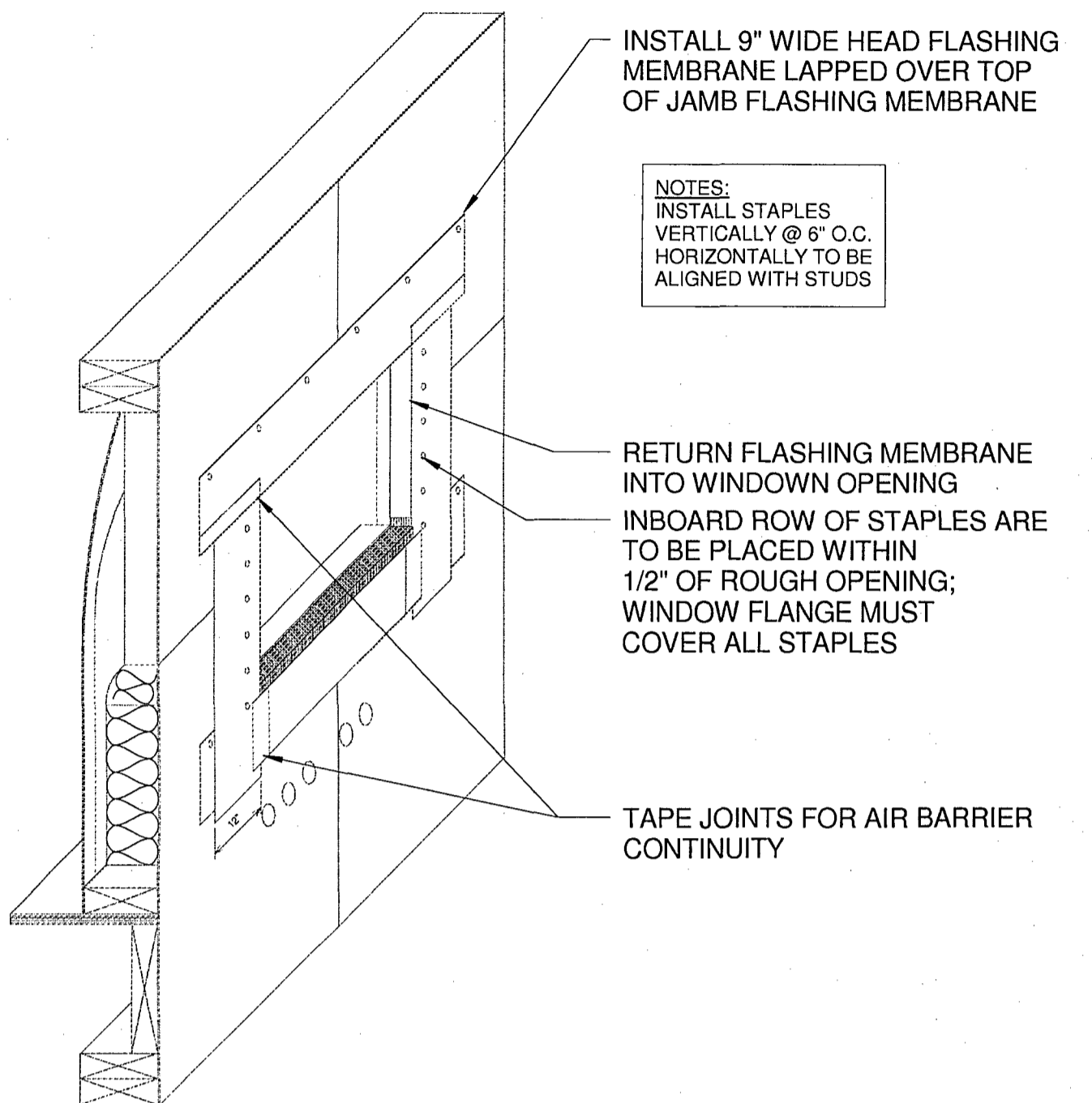




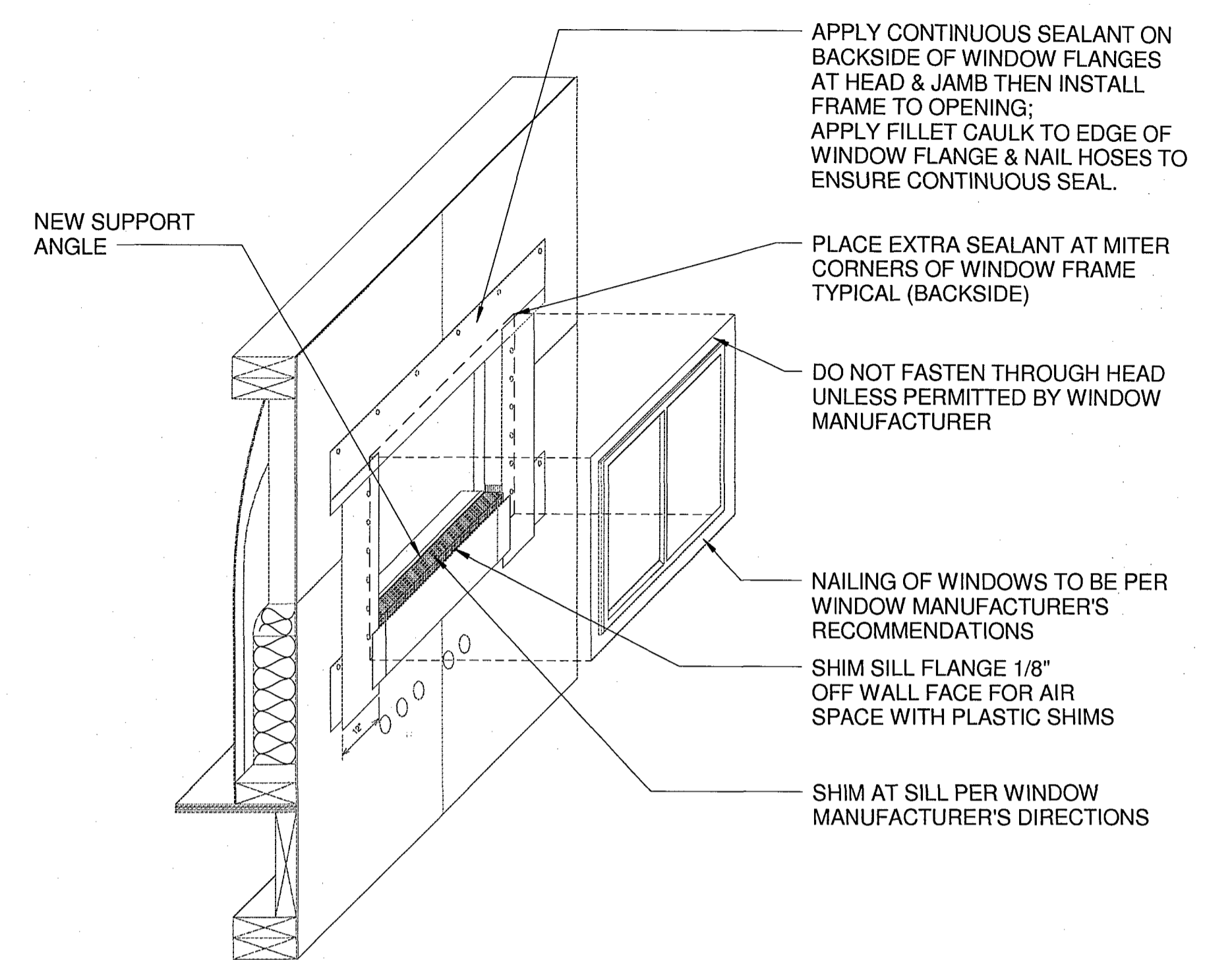
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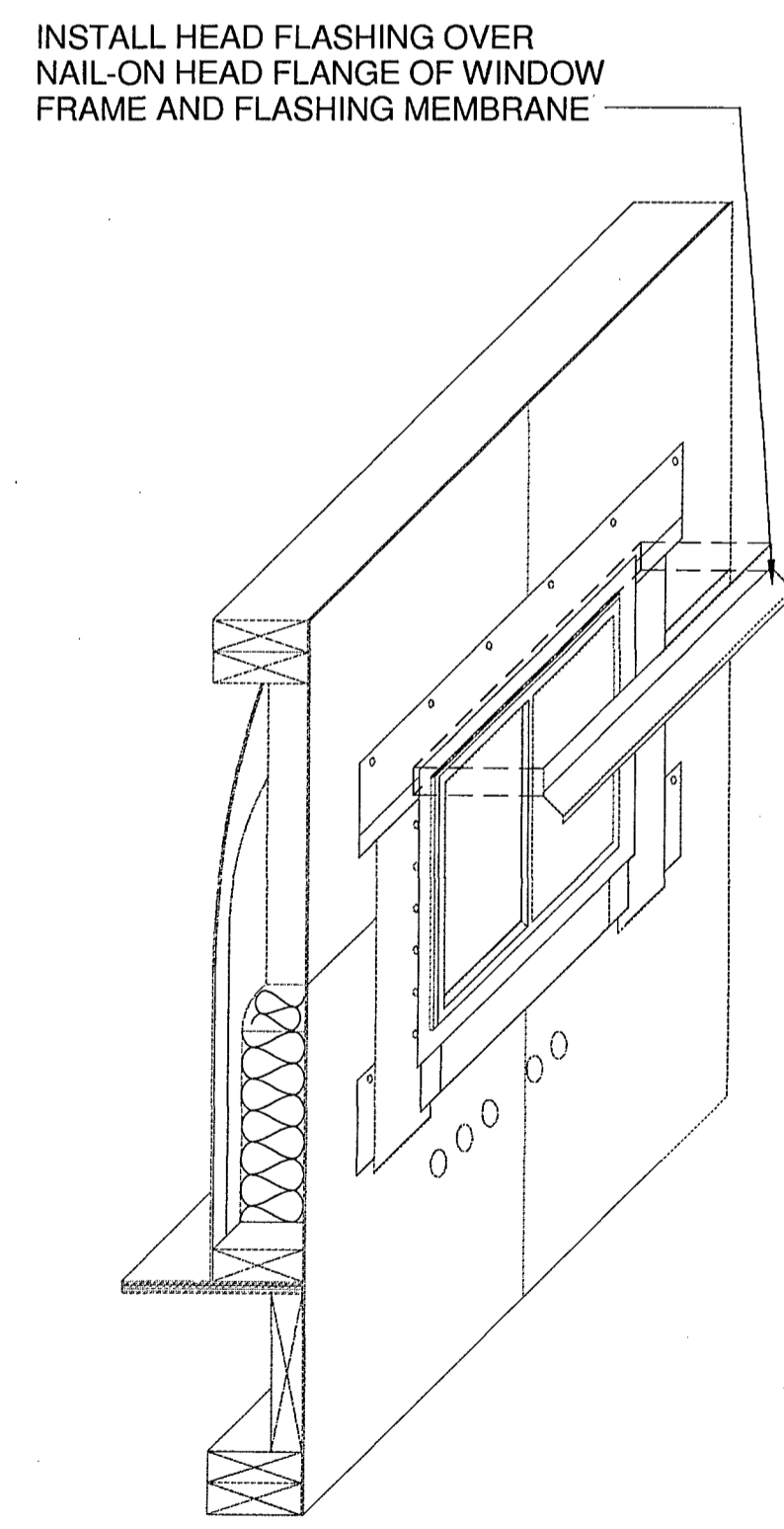
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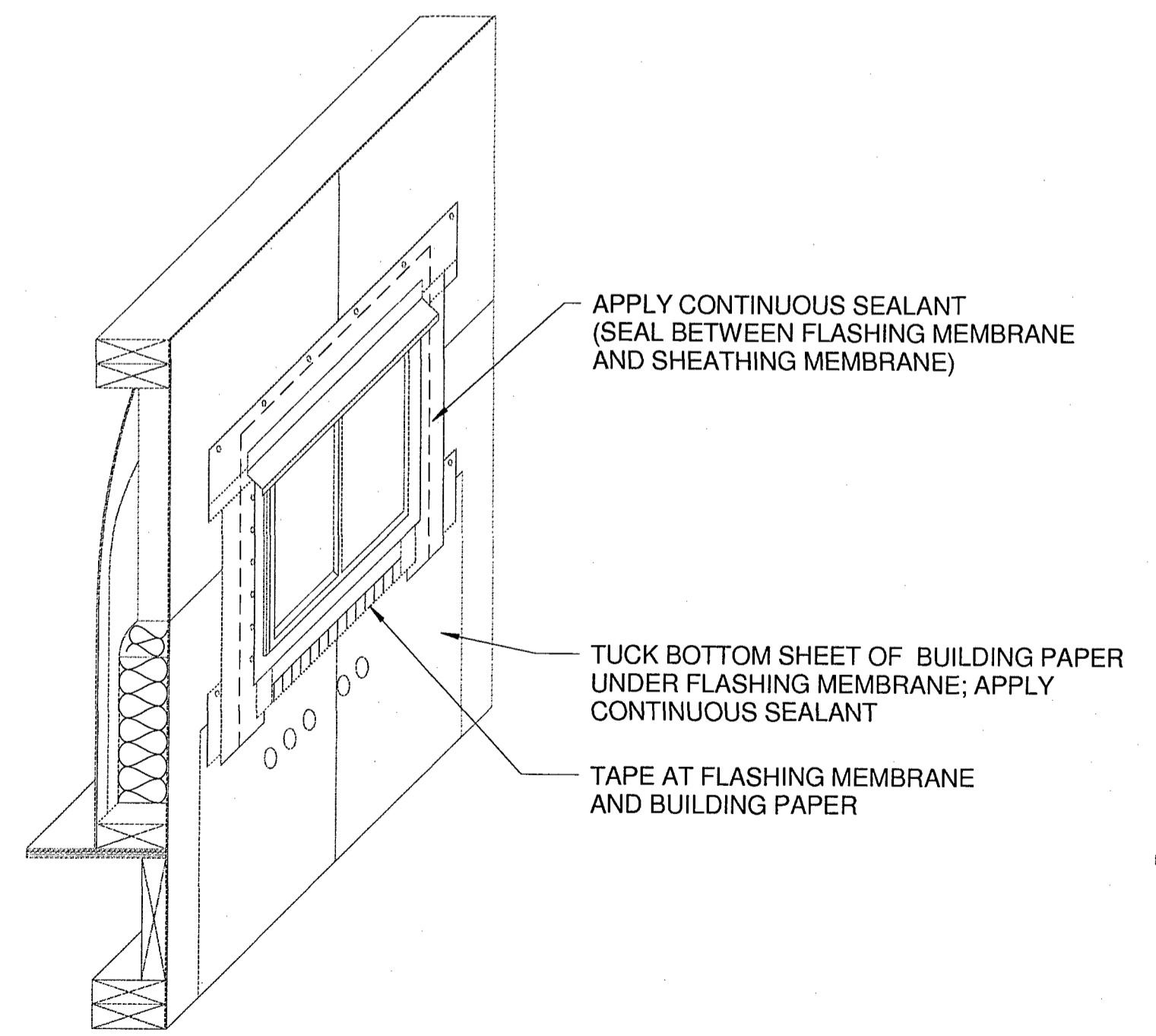
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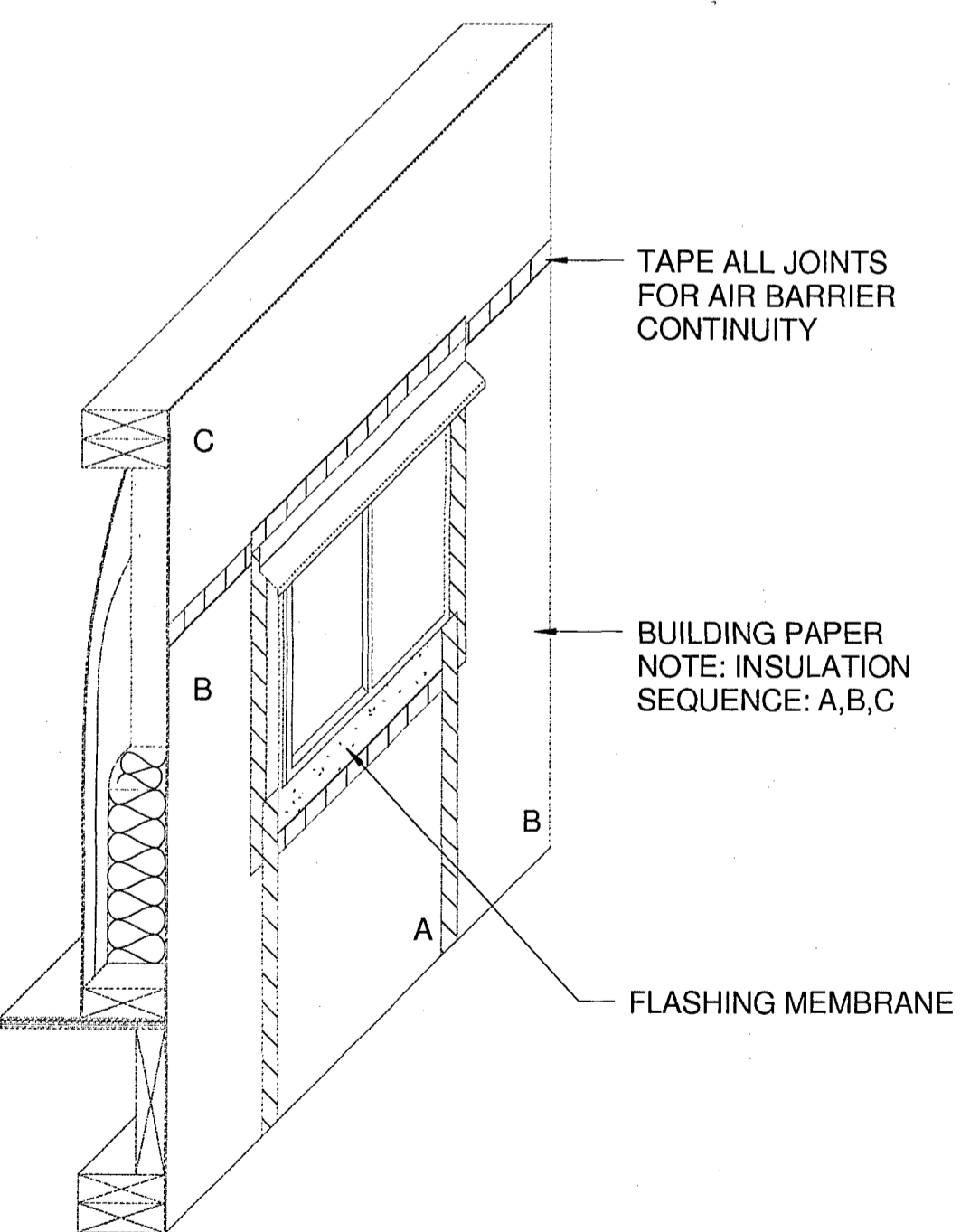
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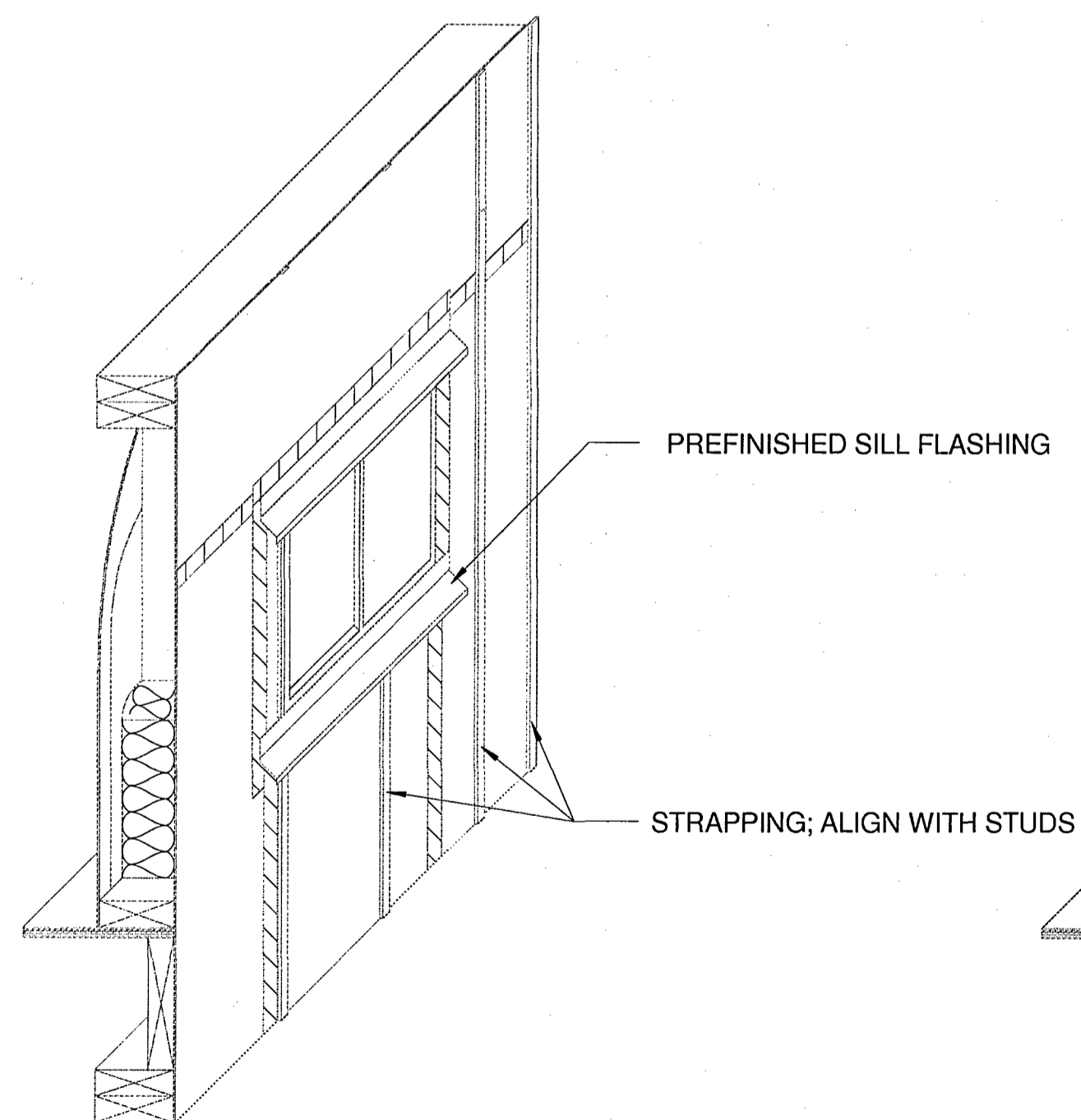
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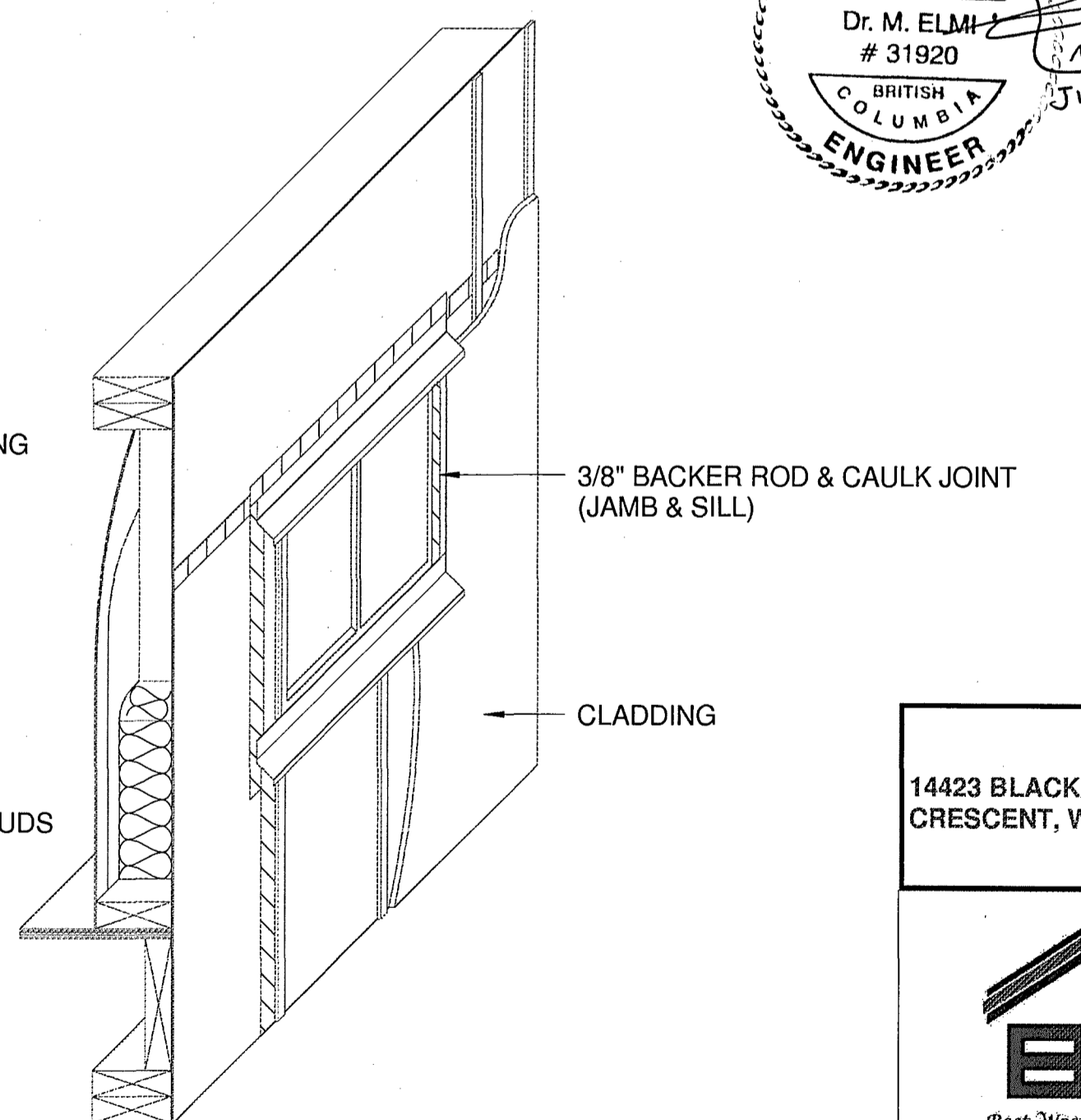
6



7



8



9

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PROVINCE OF  
BRITISH COLUMBIA  
Dr. M. ELM...  
# 31920  
M. CE 1 mi  
JUNE 5 / 2013

14423 BLACKBURN, CRESCENT, WHITEROCK, BC

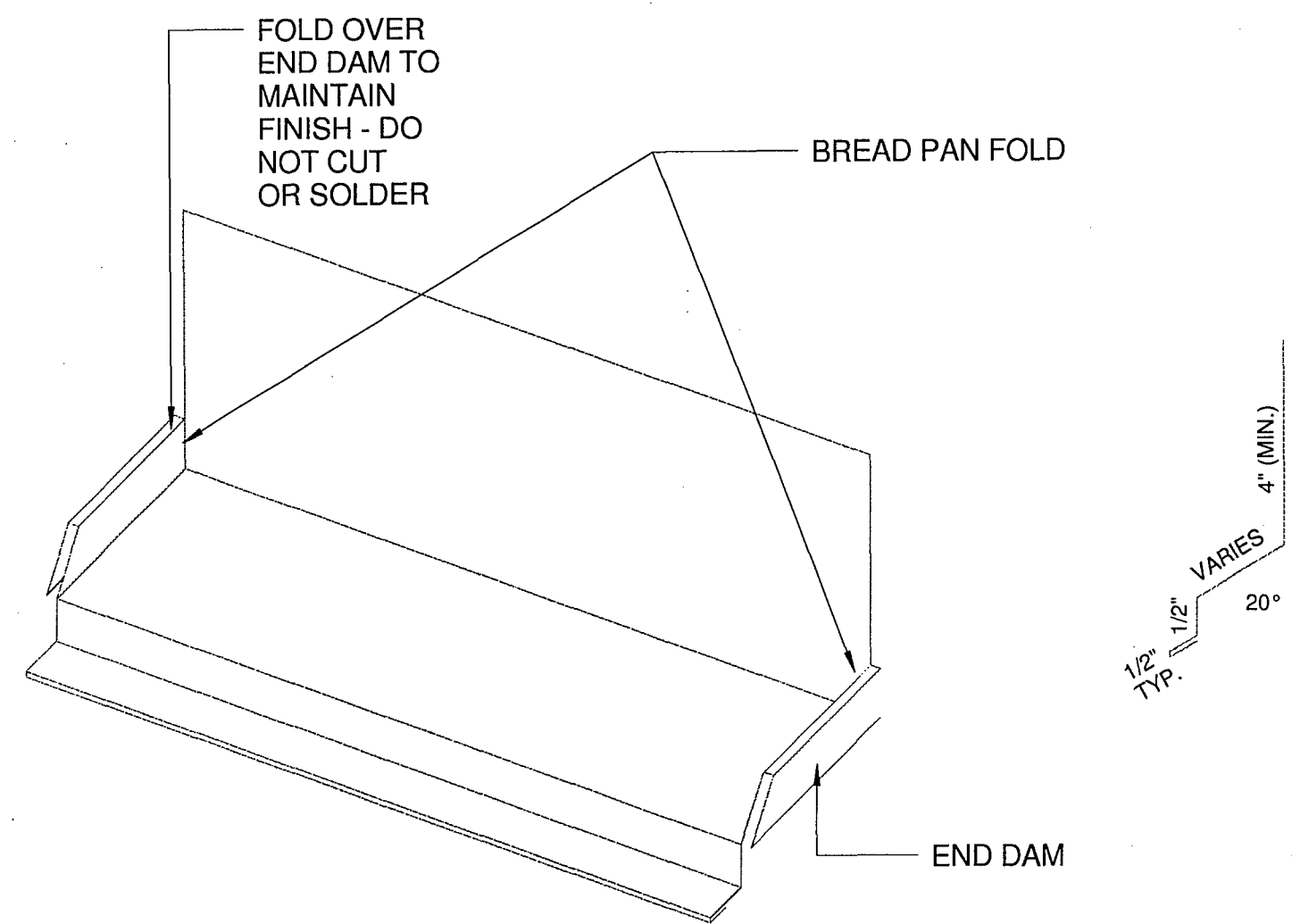


SCALE NOT TO SCALE

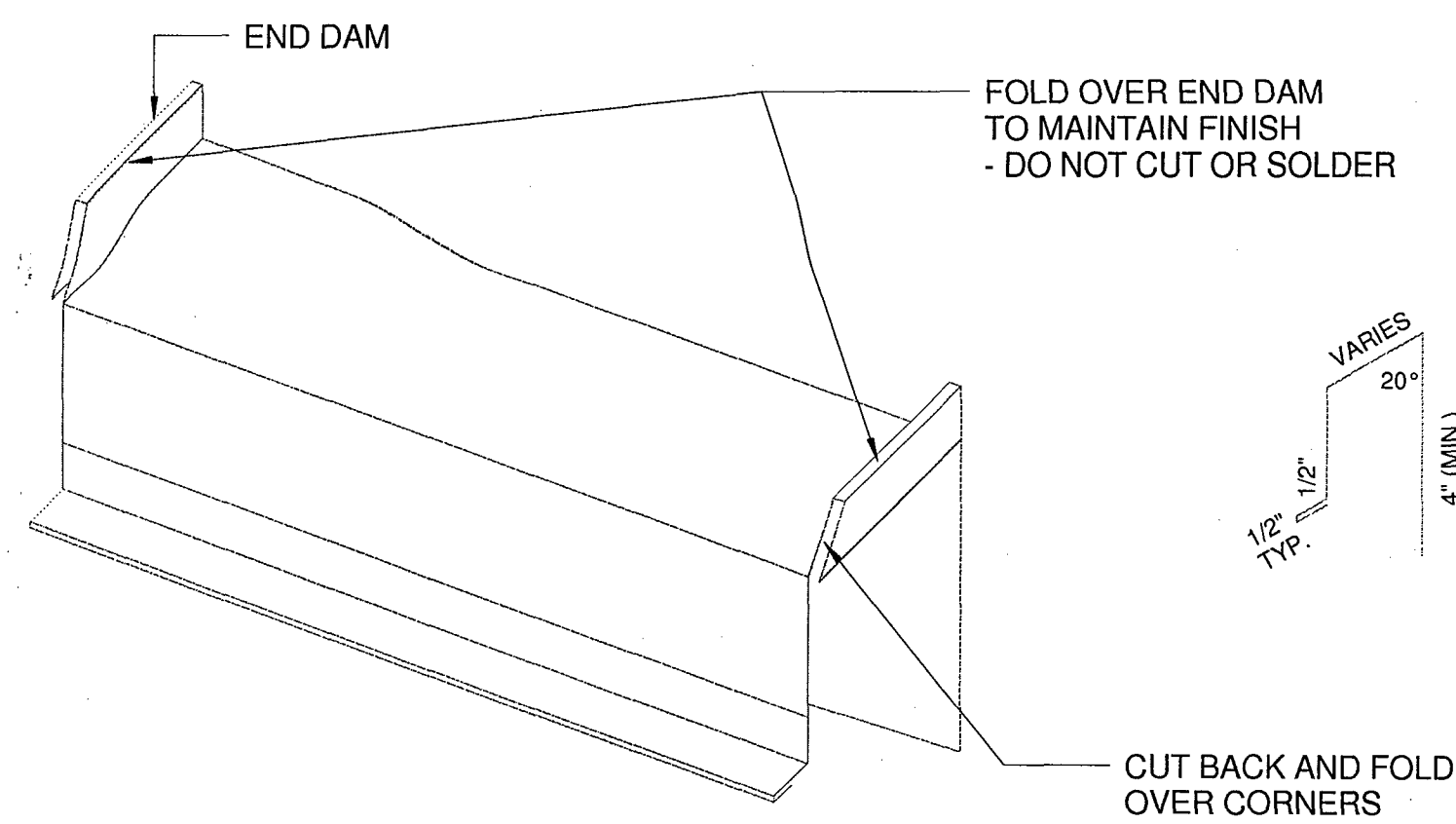
WINDOW WATERPROOFING SEQUENCE

DRAWING TITLE

SHEET NUMBER D3 REVISION 1

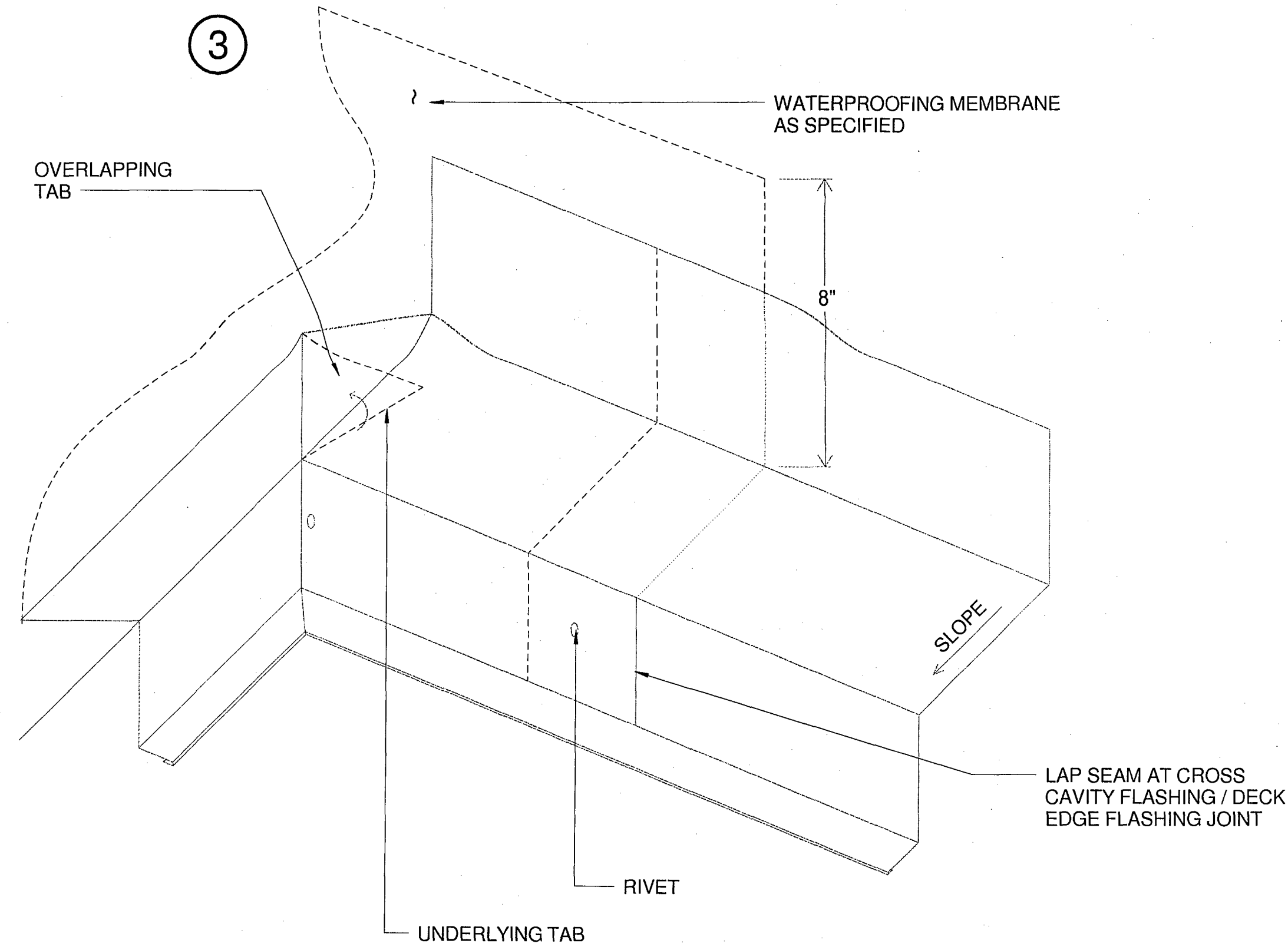
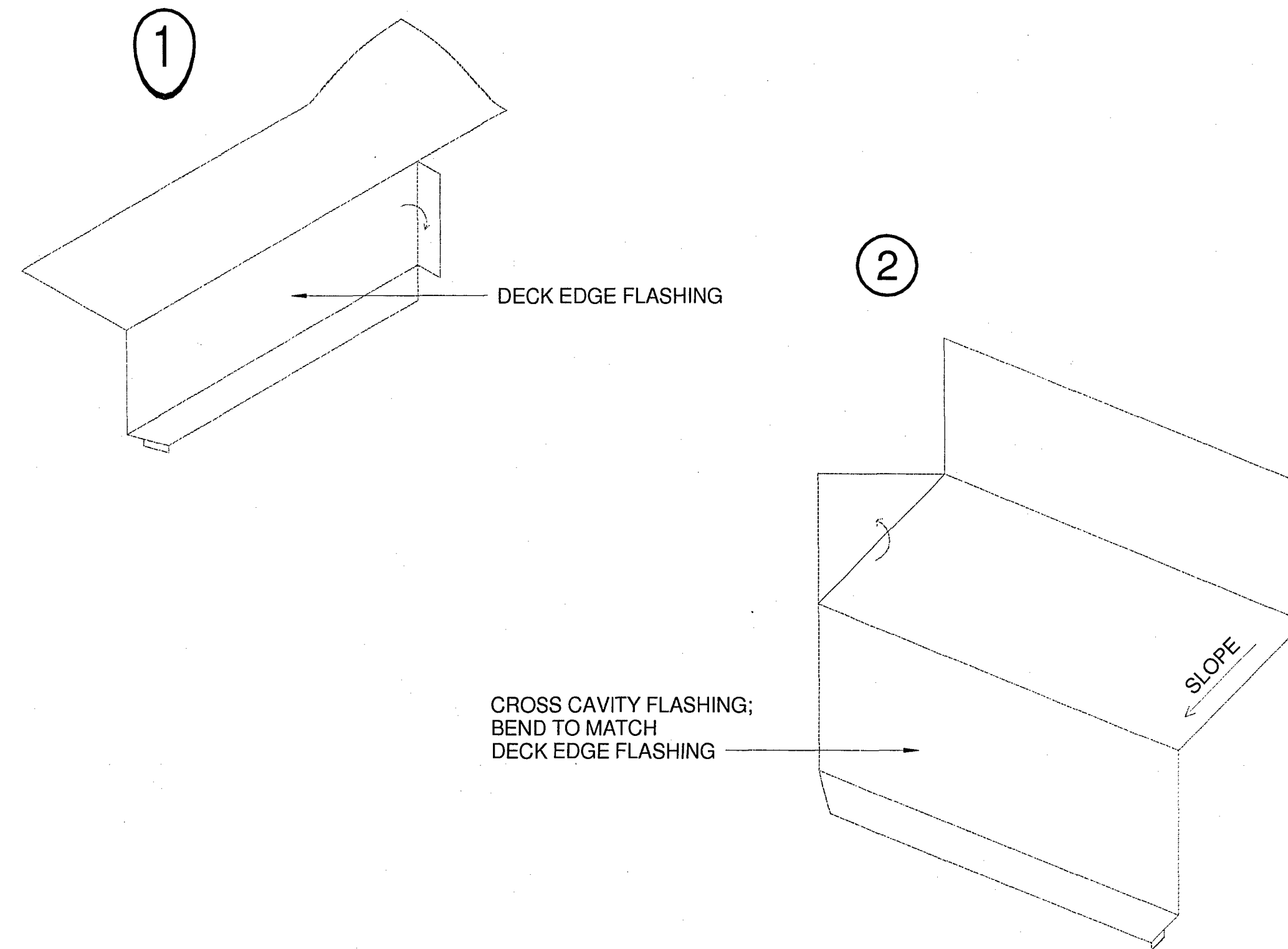


**HEAD FLASHING - WINDOW & DOOR**



**SILL FLASHING - WINDOW**

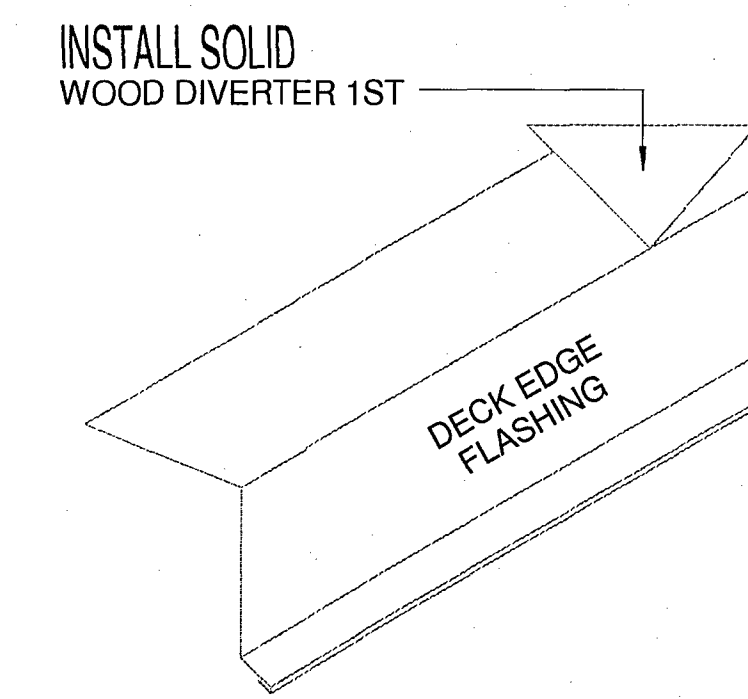
- NOTES:
- (1) PROVIDE MIN. 1/2" CLEARANCE BETWEEN FLASHING & CLADDING (TYP. FOR ALL VENTING LOCATIONS)
  - (2) FLASHING DIMENSIONS ARE SUBJECT TO VERIFICATION OF SPECIFIC SITE CONDITIONS. REFER TO SPECIFIC DETAILS.
  - (3) NO FIELD SOLDERED JOINTS.
  - (4) DOUBLE BACK HEAD FLASHINGS AT WINDOWS & DOORS WHERE SHOWN ON DETAILS.
  - (5) ANY EXPOSED UNDERSIDE OF FLASHING OR TRIMS AT WINDOW/DOOR HEADS TO BE PAINTED.



**DECK EDGE FLASHING / CROSS CAVITY FLASHING INTERFACE**

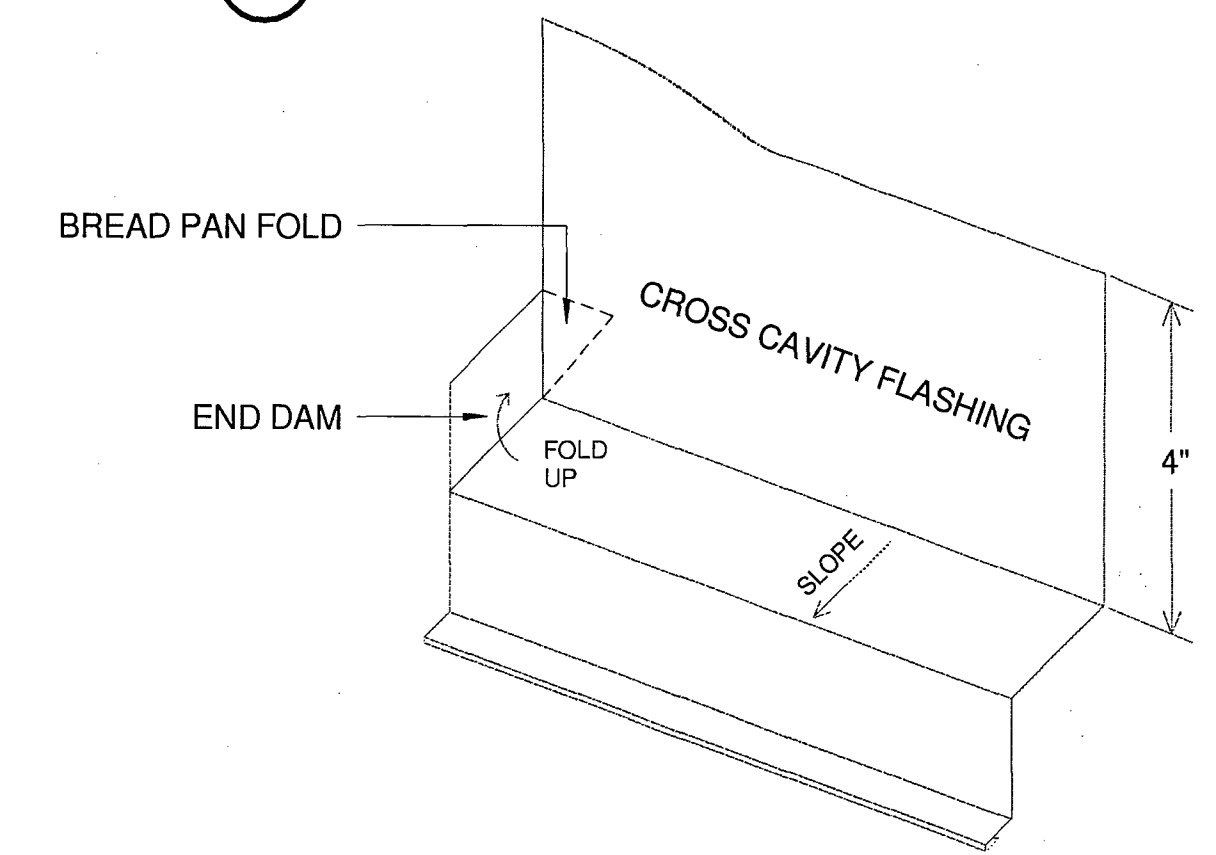
- NOTES:
- (1) AT LOCATIONS WHERE DRIP EDGE DOES NOT LINE UP WITH CROSS CAVITY FLASHING-INSTALL DIVERTER.

**1 INSTALL DECK EDGE FLASHING AND DIVERTER**

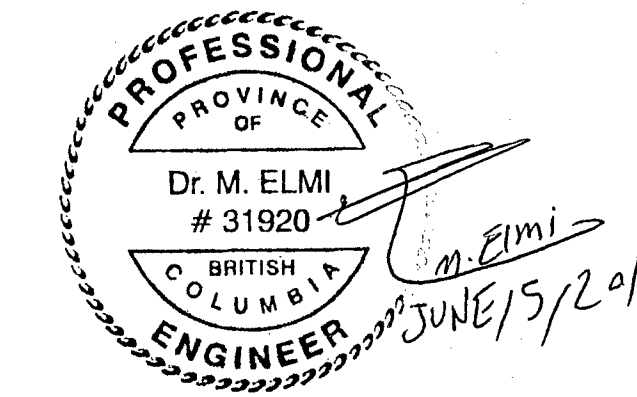
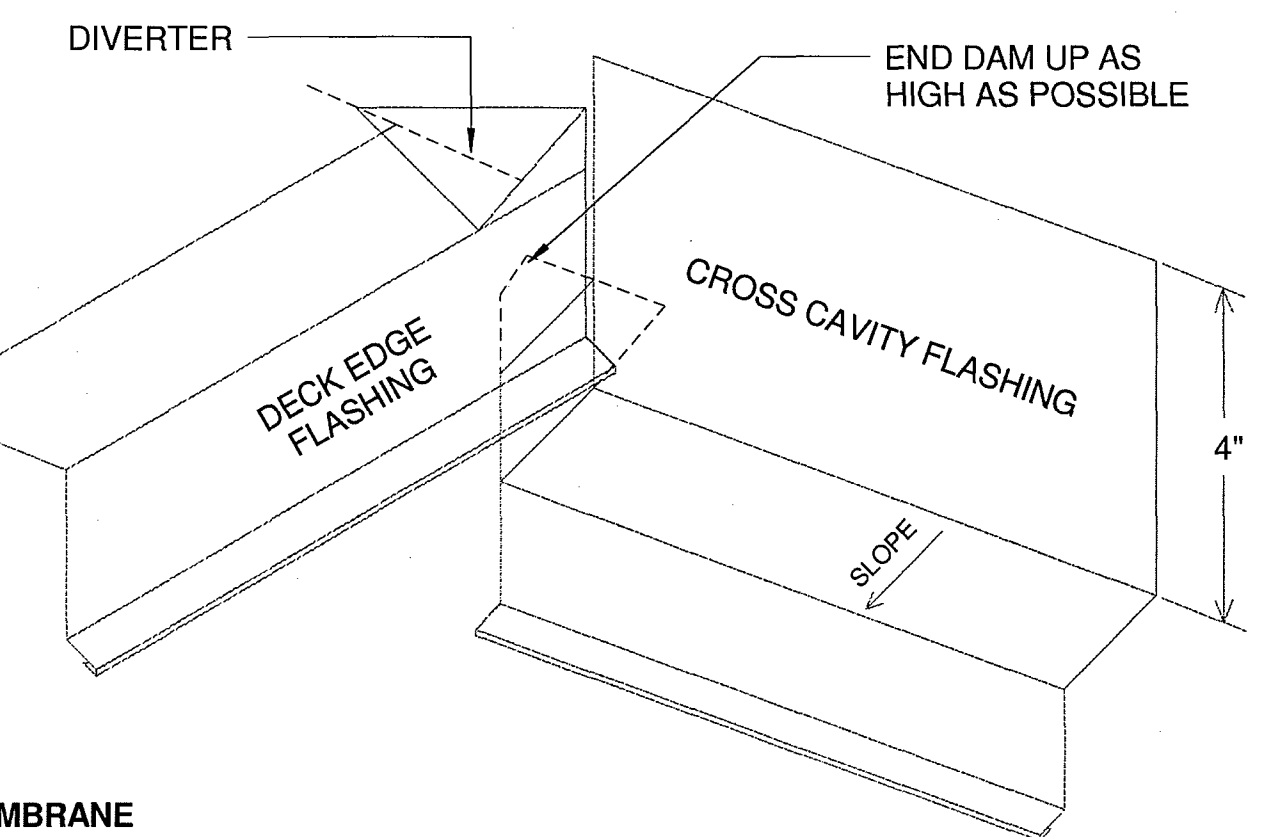


- NOTES:
- (1) AT LOCATIONS WHERE DRIP EDGE DOES NOT LINE UP WITH CROSS CAVITY FLASHING-INSTALL DIVERTER.

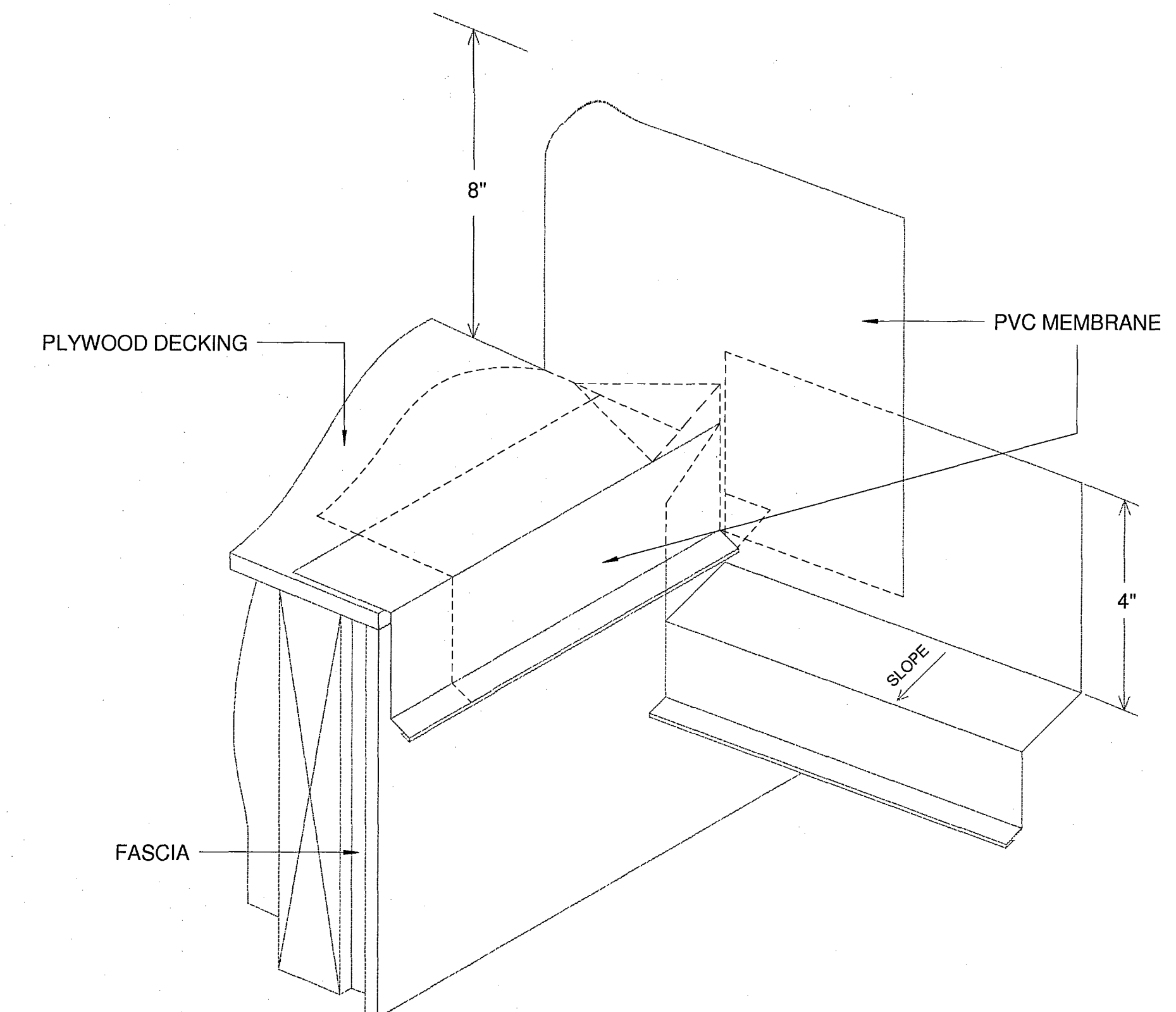
**2 FOLD UP END OF CROSS CAVITY FLASHING**



**3 FLASHING AND DIVERTER ASSEMBLY INSTALLED**



**4 INSTALL PVC MEMBRANE**



**DECK EDGE FLASHING AT DROPPED CROSS CAVITY FLASHING (PVC MEMBRANE CONDITION)**

**BWE**  
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SCALE: NOT TO SCALE

FLASHING DETAILS

14423 BLACKBURN CRESCENT, WHITEROCK, BC

DRAWING TITLE

SHEET NUMBER D4 REVISION 1