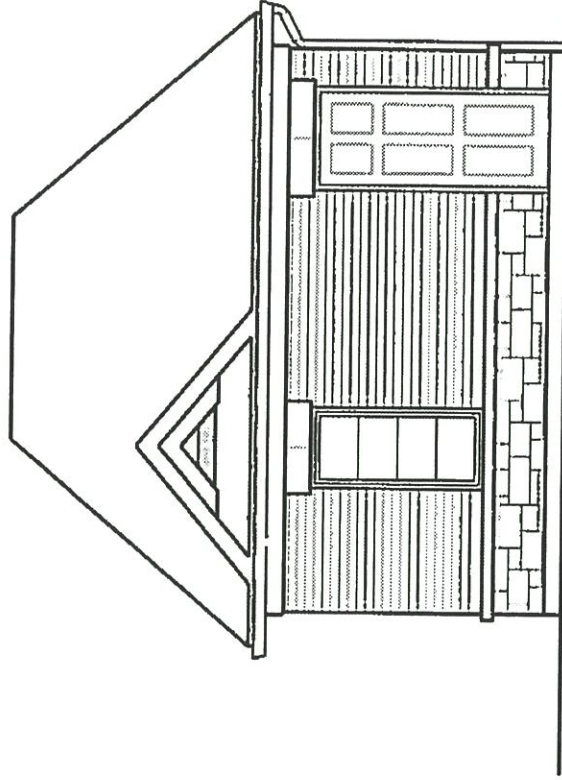




FRONT ELEVATION

METER ROOM

SB-12 ENERGY EFFICIENCY DESIGN MATRIX

SB-12 (SECTION 3.1.1) TABLE 3.1.1.2.A

PACKAGE A1

☒ GAS	☐ OIL
☐ ELECTRIC	☐ PROPANE
☐ EARTH	☐ SOLID FUEL

BUILDING COMPONENT	REQUIRED	PROPOSED
CEILING W/ ATTIC SPACE	10.56 (R60)	10.56 (R60)
CEILING W/O ATTIC SPACE	5.46 (R31)	5.46 (R31)
EXPOSED FLOOR	5.46 (R31)	5.46 (R31)
WALLS ABOVE GRADE	3.87 (R22)	3.87 (R22)
BASEMENT WALLS	3.52 ci (R20 ci) *	3.52 ci (R20 ci) *
* PROPOSED VALUES MAY BE SUBSTITUTED W/ 2.11 + 1.76ci (R12 + R10ci)		
BELOW GRADE SLAB ENTIRE SURFACE > 600mm BELOW GRADE	-	-
EDGE OF BELOW GRADE SLAB ≤ 600mm BELOW GRADE	1.76 (R10)	1.76 (R10)
HEATED SLAB OR SLAB ≤ 600mm BELOW GRADE	1.76 (R10)	1.76 (R10)
WINDOWS/SLIDING GLASS DOORS (MAX U-VALUE)	1.6	1.6
SKYLIGHTS (MAX. U-VALUE)	2.8	2.8
SPACE HEATING EQUIP. (AFUE%)	96%	96%
HRV EFFICIENCY (%)	75%	75%
DHW HEATER (EF)	0.8	0.8

AREA CALCULATIONS

STD. PLAN	
GROUND FLOOR AREA	184 sq. ft.
SECOND FLOOR AREA	0 sq. ft.
SUBTOTAL	184 sq. ft.
DEDUCT ALL OPEN AREAS	0 sq. ft.
TOTAL NET AREA	184 sq. ft. (17.09 sq. m.)

KINGS LANDING



THE UNDERSIGNED HAS REVIEWED AND TAKES RESPONSIBILITY FOR THE DESIGN AND THE QUALIFICATIONS AND MEETS THE REQUIREMENTS SET OUT IN THE CANADIAN BUILDING CODE TO BE A DESIGNER

NAME: Kent McLaughlin

REGISTRATION INFORMATION: BOUNDARY: 38175 BC1

HUNT DESIGN ASSOCIATES INC. 19695

All drawings specifications and documents are the copyright property of Hunt Design Associates (H.D.A.). Reproduction of this property in whole or in part is strictly prohibited without H.D.A.'s written permission. H.D.A. assumes no responsibility or liability for the accuracy or quality of the information and/or data provided.

HUNT ASSOCIATES INC.

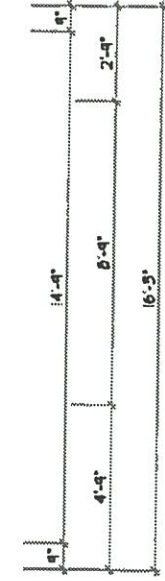
www.huntassociates.ca

ESQUIRE HOMES - 214090
KINGS LANDING, AJAX, ONTARIO

Drawn By: JP
Checked By: KM
Scale: 3/16"=1'-0"
8966 Woodbine Ave., Markham, ON L3R 0J7
T 905.737.5133 F 905.737.7326

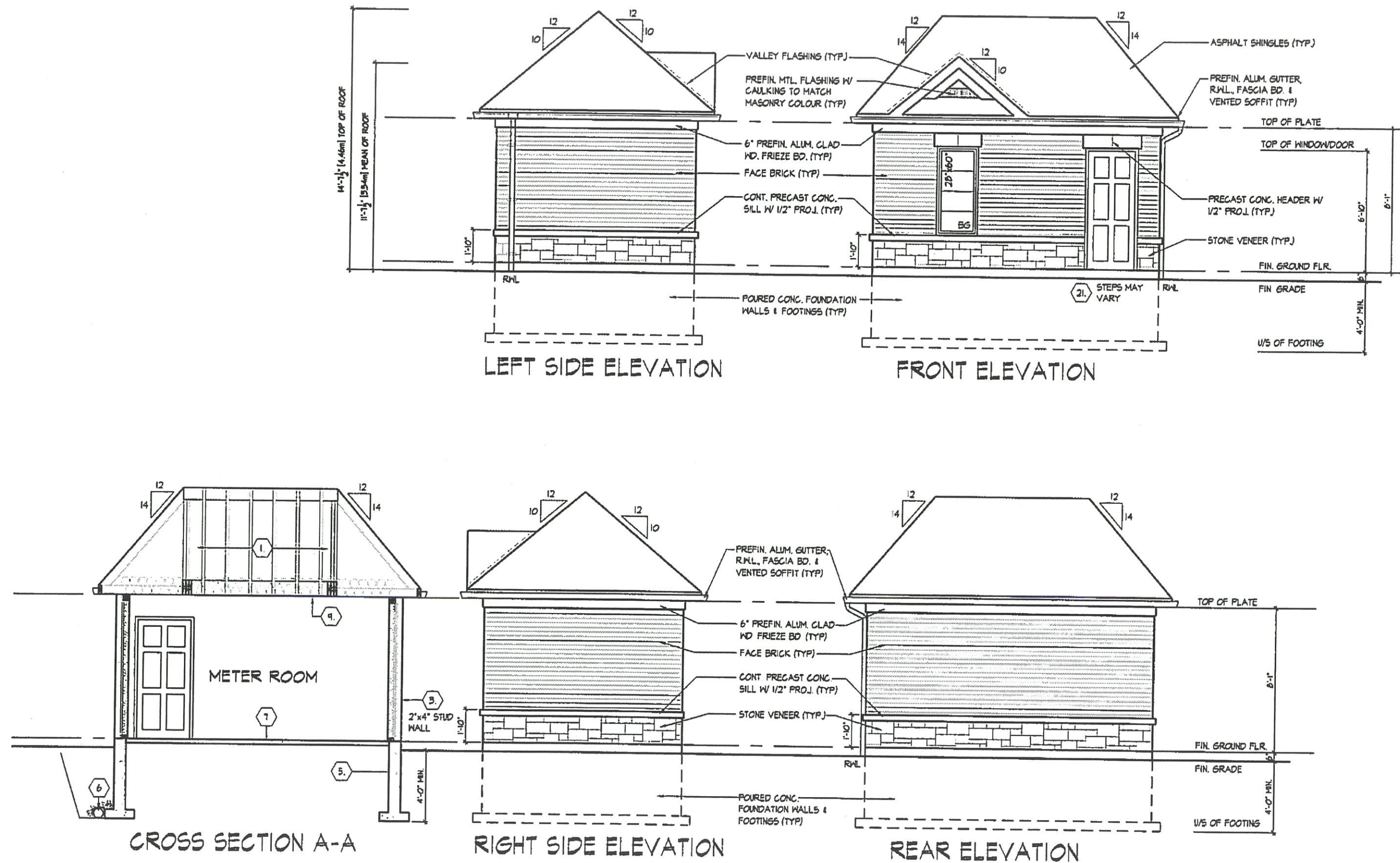
TITLE PAGE
METER ROOM
REV. 2019.01.17

Page Number: 1 of 5



FOUNDATION PLAN





ROOF OVERHANGS ARE TO BE 12" UNLESS NOTED OTHERWISE

ELEVATIONS & SECTION A-A

ESQUIRE HOMES - 214090

KING'S LANDING, AJAX, ONTARIO

214090WD MeterRoom.dwg

REV.2019.01.17

Page Number 3 of 5

HUNT DESIGN ASSOCIATES INC.

www.hunt-design.ca

38175

19605

THE UNDERSIGNED HAS REVIEWED AND TAKES RESPONSIBILITY FOR THIS DESIGN AND HAS THE QUALIFICATIONS AND MEETS THE REQUIREMENTS SET OUT IN THE ONTARIO BUILDING CODE TO BE A DESIGNER

QUADRA-CAD INFORMATION

Kent McLaughlin

REGISTRATION APPROBATION

HUNT DESIGN ASSOCIATES INC.

8966 Woodbine Ave, Markham, ON L3R 0J7 T 905.737.5133 F 905.737.7326

Quantity JP

Scale 3/16"=1'-0"

Checked by KM

Drawn by

1 HR. PARTY WALL (CONC. BLOCKS) (SB-3) WALL TYPE B&F & B1d)
1/2" (12.7) GYPSUM EACH SIDE ON 2"x2" (50.8) VERTICAL WD STRAPPING @ 24" (610) O.C. ON 8" (203) CONC. BLOCK FULL STRAPPING CAVITY EACH SIDE WITH AT LEAST 90% OF ABSORPTIVE MATERIAL PROCESSED FROM ROCK, SLAG OR GLASS, TAPES, FILL & SAND ALL GYPSUM JOINTS. EXPOSED BLOCK MUST BE SEALED W/2 COATS OF PAINT OR FURRED WITH 2"x2" (50.8) WD. STRAPPING & 1/2" (12.7) GYPSUM SHEATHING

- 53.5°C
254" (115 in) TYPE "X" GYPSUM SHEATHING ON EXTERIOR SIDE OF 2 ROWS OF STUDS (30-49) STUDS @ 16" (406) O.C. MIN. 1" (25) APART ON SEPARATE 2x4 (30-49) SILL PLATES (2x6) (30x140) AS REQUIRED FILL ONE SIDE OF STUD CAVITY WITH AT LEAST 90% OF ABSORPTIVE MATERIAL PROCESSED FROM ROCK, SLAG OR GLASS, FIBER FILL AND SAND ALL GYPSUM JOINTS

- STUCCO WALL CONSTRUCTION**
- STUCCO FINISH CONFORMING TO B.C. SECTION 9.28, AND APPLIED PER MANUFACTURER'S SPECIFICATIONS OVER 1/2" (9.5) E.L.F.S. MINIMUM ON APPROVED DRAINAGE MAT ON 1/2" (12.7) DENSIGLASS GOLD STUCCO BOARD ON STUDS CONFORMING TO B.C. (9.23.10.1) & SECTION 1.1. INSULATION, APPROVED 5 MIL. POLYETHYLENE VAPOUR BARRIER, 1/2" (12.7) GYPSUM WALLBOARD INT. FINISH. (REFER TO 5S NOTE AS REQUIRED)

- 41B** STUCCO FINISH CONFORMING TO O.B.C. SECTION 9.20, AND APPLIED PER MANUFACTURERS SPECIFICATIONS OVER 1" (26) E.F.S (MINIMUM) ON APPROVED DRAINAGE MAT ON 1/2" (12.7) DENSGLASS GOLD GYPSUM BRD. ON STUDS CONFORMING TO O.B.C. (9.23.4.1) & SECTION 1.1, 1/2" (12.7) GYPSUM WALLBOARD FINISH (REFER TO 35 NOTE AS REQ.)
- *** FOR DETAILS USING CONFIN. INSULATION CONSTRUCTION, PROVIDE APPROVED DRAINAGE MAT ON 7/16" (11) EXTERIOR TYPE SHEATHING OVER FLOORING (AS REQ.) AND STUDS IN 1/2" (26) E.F.S (MINIMUM) ON APPROVED DRAINAGE MAT ON 1/2" (12.7) DENSGLASS GOLD GYPSUM BRD.
- 42** **UNISPOURED FOUNDATION WALLS (R/15.4.2)**

- BARS TO HAVE MIN. 2" (50) CLEAR CONC. COVER OUTSIDE FACE & 3/4"
 CLEAR COVER INSIDE FACE
 - BARS TO EXTEND 2'-0" (610) BEYOND BOTH SIDES OF OPENING
 VERTICAL REINFORCING / REINFORCING AT BASEMENT WINDOWS
 2-15M HORIZ. REINFORCING ON THE INSIDE AND OUTSIDE FACE OF THE
 FOUNDATION WALL BELOW THE WIN. SILL. EXTEND BARS 2' (610) BEYOND
 THE OPENING 2-15M VERTICAL REINFORCING ON THE INSIDE AND OUTSIDE
 FACE OF THE FOUNDATION WALL ON EACH SIDE OF THE WINDOW OPENING
 - BARS TO HAVE MIN. 2" (50) CLEAR CONC. COVER OUTSIDE FACE & 3/4"
 CLEAR COVER INSIDE FACE
 - BARS TO EXTEND 2'-0" (610) BEYOND BOTH SIDES OF OPENING

- 44 WINDOW WELLS

- 46** **FLAT ROOF/FALCON CONSTRUCTION**
WATERPROOFING MEMBRANE (9'x23 1/2", 9'x26 1/2", 9'x28 1/2") FULLY ADHERED TO 5/8" (16.3) 180 EXTERIOR GRADE PLYWOOD SHEATHING ON 2"x2" 36"x36" PURLINS (SINGLE TOWARDS SCUPPER) 2% MINIMUM LAID PERPENDICULAR TO 2"x8" 36"x48" FLOOR JOISTS 1/2" (12.7) 4065 (C) UNLESS OTHERWISE NOTED). BUILT UP CURB TO EDGE TO BE PROVIDED ON OUTSIDE FACE OF CURB. CONTINUOUS 1" THICK EDGE TO BE PROVIDED ON OUTSIDE FACE OF CURB. SCUPPER DRAIN TO BE LOCATED 24" (610) MIN. AWAY FROM HOUSE. PREFINISHED ALUMINUM OR PANEL FOR UNDERSIDE OF SOFTI (9'x22.3). REMOVE CURB WHEN REQ.

- 47** **BARREL VAULT CONSTRUCTION**
CANTILEVERED 2"x4" (3x4x6) SPACETS Laid FLAT ON 2"x10" (3x2x5) SPR. #2
ROOF JOIST Nailed TO BUILT-UP 3-3/4" (19") PL WOOD HEADER PROFILED FOR
BARREL. SPRAY FOAM INSULATION BETWEEN JOISTS W/ GYPSUM BOARD
INTERIOR FIN. (REFER TO DETAILS)

- REFER TO THIS CHART FOR STUD SIZE & SPACING AS REQUIRED FOR EXTERIOR WALLS ONLY. REFER TO SIBING & GRADING PLAN OF THIS UNIT FOR CONCRETION OF TOP OF FOUNDATION WALL AND ADDITIONAL INFORMATION.
- IF STUD WALL HEIGHT EXCEEDS MAX. UNSUPPORTED HEIGHT, WALL NEEDS TO BE REVIEWED AND APPROVED BY ENGINEER.

SECTION 2.0. GENERAL NOTES

2.1. WINDOWS

1) EXCEPT WHERE A DOOR ON THE SAME FLOOR LEVEL AS THE BEDROOM PROVIDES DIRECT ACCESS TO THE EXTERIOR, EVERY FLOOR LEVEL CONTAINING A BEDROOM IS TO HAVE AT LEAST ONE OUTSIDE WINDOW W/ 0.35m² UNOBTSTRUCTED OPEN PORTION W/ NO DIMENSION LESS THAN 1'-3" (380), CAPABLE OF MAINTAINING THE OPENING WITHOUT THE NEED FOR ADDITIONAL SUPPORT, CONFORMING TO 9.9.10.

2) WINDOW GUARDS: A GUARD OR A WINDOW WITH A MAXIMUM RESTRICTED OPENING WIDTH OF 4" (100) IS REQUIRED WHERE THE TOP OF THE WINDOW SILL IS LOCATED LESS THAN 1'-7" (480) ABOVE FIN. FLOOR AND THE DISTANCE FROM THE FINISHED FLOOR TO THE ADJACENT GRADE IS GREATER THAN 5'-11" (1800). (§ 9.8.1.1)

3) WINDOWS IN EXT. STAIRWAYS THAT EXTEND TO LESS THAN 2'-11" (600) [3'-6" (1070) WITH NOTE 22 ABOVE], OR THE WINDOW SHALL BE NON-OPERABLE AND DESIGNED TO WITHSTAND THE SPECIFIED LOADS FOR BALCONY GUARDS AS PROVIDED IN 1.1.5.15 OR 9.8.2

THE CEILING HEIGHTS OF ROOMS AND SPACES SHALL CONFORM TO TABLE 9.5.3.1

2.3. MECHANICAL / PLUMBING

- 2) REFER TO HOT WATER TANK MANUFACTURER SPECS. CONFORM TO OBC 9.31.6.
3) REFER TO TITLE PAGE FOR SPACE HEATING EQUIPMENT, HWY AND DOMESTIC HOT WATER HEATER MINIMUM EFFICIENCIES.
4) DRAIN WATER HEAT RECOVERY (UNIT'S) WILL BE INSTALLED CONFORMING TO THE REQUIREMENTS OF 3.11.2 OF THE O.B.C.

- 2) STUDS SHALL BE STUD GRADE SPRUCE, UNLESS NOTED OTHERWISE.
- 3) LUMBER EXPOSED TO THE EXTERIOR TO BE SPRUCE NO. 2 GRADE PRESSURE TREATED OR CEDAR, UNLESS NOTED OTHERWISE.

- 2.5. STEEL @234.3

- 2.6. FLAT ARCHES
 1) FOR 8'-0" (2400) CEILINGS, FLAT ARCHES SHALL BE 8'-10" (2600) A.F.F.
 2) FOR 9'-0" (2740) CEILINGS, FLAT ARCHES SHALL BE 7'-10" (2400) A.F.F.
 3) FOR 10'-0" (3040) CEILINGS, FLAT ARCHES SHALL BE 8'-6" (2600) A.F.F.

- 2.9. GRADING
THE BUILDING SHALL BE LOCATED ON THE BUILDING SITE GRADED SO THE WATER WILL NOT ACCUMULATE AT OR NEAR THE BUILDING AND WILL NOT ADVERSELY AFFECT ADJACENT PROPERTIES. CONFORM TO 9.14.6.

**3.1. WOOD LINTELS AND BUILT-UP WOOD
(DIVISION B PART 9, TABLES AB TO A10 AND A12, A15 & A16)
DRAWING PART OF SENTENCE 9.23.4.2 (C), 9.23.4.2(4), 9.23.4.2(8), 9.23.4.2(13), 9.23.4.2(18) 9.23.7.3.1**

SIZE	BRICK	STONE
3 1/2 x 3 1/2 x 1 3/4 (89 x 89 x 64)	8-1 (2,47m)	7-6 (2,30m)
4" x 3 1/2 x 1 3/4 (102 x 89 x 64)	8-9 (2,66m)	8-1 (2,49m)
4 7/8 x 3 1/2 x 1 3/4 (127 x 89 x 73)	10-10 (3,31m)	10-1 (3,00m)
4 7/8 x 3 1/2 x 3 3/8 (127 x 89 x 11)	11-5 (3,48m)	10-7 (3,24m)
5 7/8 x 3 1/2 x 3 3/8 (152 x 89 x 11)	12-6 (3,82m)	11-7 (3,54m)
7 1/8 x 3 1/2 x 3 3/8 (178 x 102 x 11)	14-1 (4,30m)	13-1 (4,00m)

3.3. DOOR SCHEDULE	
CONFORMING TO SECTIONS 9.5.11, 9.6, 9.7.2.1, 9.7.5.2, 9.9.40 AND 13.10	
1	EXTERIOR 2'-8" x 6'-8" x 1-3/4" (815 x 2030 x 45) INSULATED MIN. R4 (RSI 0.7)
1A	EXTERIOR 2'-10" x 6'-8" x 1-3/4" (865 x 2030 x 45) INSULATED MIN. R4 (RSI 0.7)
1B	EXTERIOR 3'-0" x 6'-8" x 1-3/4" (915 x 2030 x 45) INSULATED MIN. R4 (RSI 0.7)
1C	EXTERIOR 2'-6" x 6'-8" x 1-3/4" (760 x 2030 x 45) INSULATED MIN. R4 (RSI 0.7)
1D	EXTERIOR 2'-8" x 6'-0" x 1-3/4" (815 x 2030 x 45) INS. MIN. R4 (RSI 0.7) (SEE HEX NOTE)
1E	EXTERIOR 3'-0" x 6'-0" x 1-3/4" (915 x 2040 x 45) INSULATED MIN. R4 (RSI 0.7)
2A	EXTERIOR 7'-8" x 13'-4" (5'5" x 2030 x 45) 20 MIN. FRR DOORFRAME WITH SELF-CLOSING

ATF	ABOVE FINISHED FLOOR	JST	JOST
-----	----------------------	-----	------

ALL ELECTRICAL FACILITIES SHALL BE INSTALLED IN ACCORDANCE WITH SECTION 9.3.

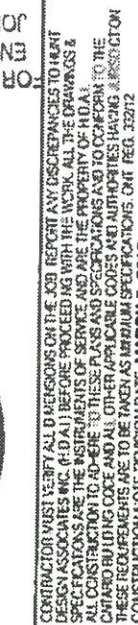
- ◆ C-M-D CARBON MONOXIDE ALARM** (§ 31-4)
 ** CHECK LOCAL BYLAWS FOR REQUIREMENTS ** A CARBON MONOXIDE ALARM(S) CONFORMING TO CAN/CGA-6-11 SHALL BE INSTALLED ON OR NEAR THE CEILING IN EACH DWELLING UNIT ADJACENT TO EACH SLEEPING AREA. CARBON MONOXIDE ALARM(S) SHALL BE PERMANENTLY WIRED WITH NO DISCONNECT SWITCH. WITH AN ALARM THAT IS AUDIBLE WITHIN SLEEPING ROOMS WHEN THE INTERVENING DOORS ARE CLOSED.

- EXPOSED BUILDING FACE - O.B.C. 9.10.14 OF 9.10.15.**

- 1 HR. PARTY WALL
REFER TO HEX NOTE 40.

DESIGN SNOW LOAD (9.4.2.2.): 1.00 kPa
WIND LOAD (q50) (SB-1.2.): 0.48 kPa

CONFIDENTIAL



1 - 214090
AJJAX, ONTARIO