



# CARPORT GUIDE



A GUIDE FOR HOME OWNERS

*January 2011*

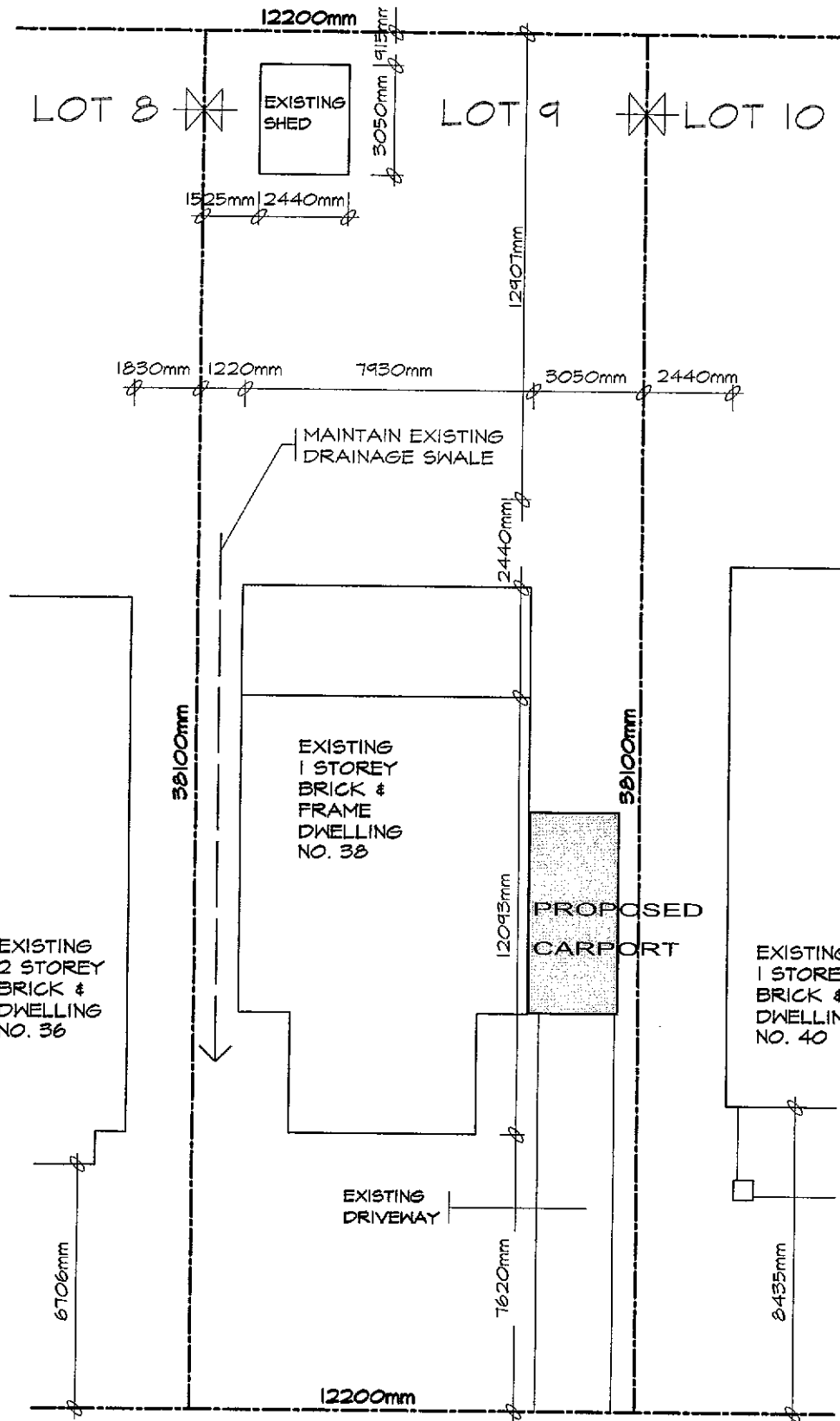
## ***OUR GOAL***

Is to ensure that buildings in Niagara Falls are constructed safely & in accordance with best interests of the owner, the occupants and the community.

## ***ASK US!!!***

We are approachable and anxious to be of service. Describe your project to us and we'll outline the permit requirements for you - together we can assure a quality building project.

Building & Inspection Services  
City Hall (Main Floor)  
4310 Queen Street, Niagara Falls  
(905) 356-7521 ext. 4344 or 4213

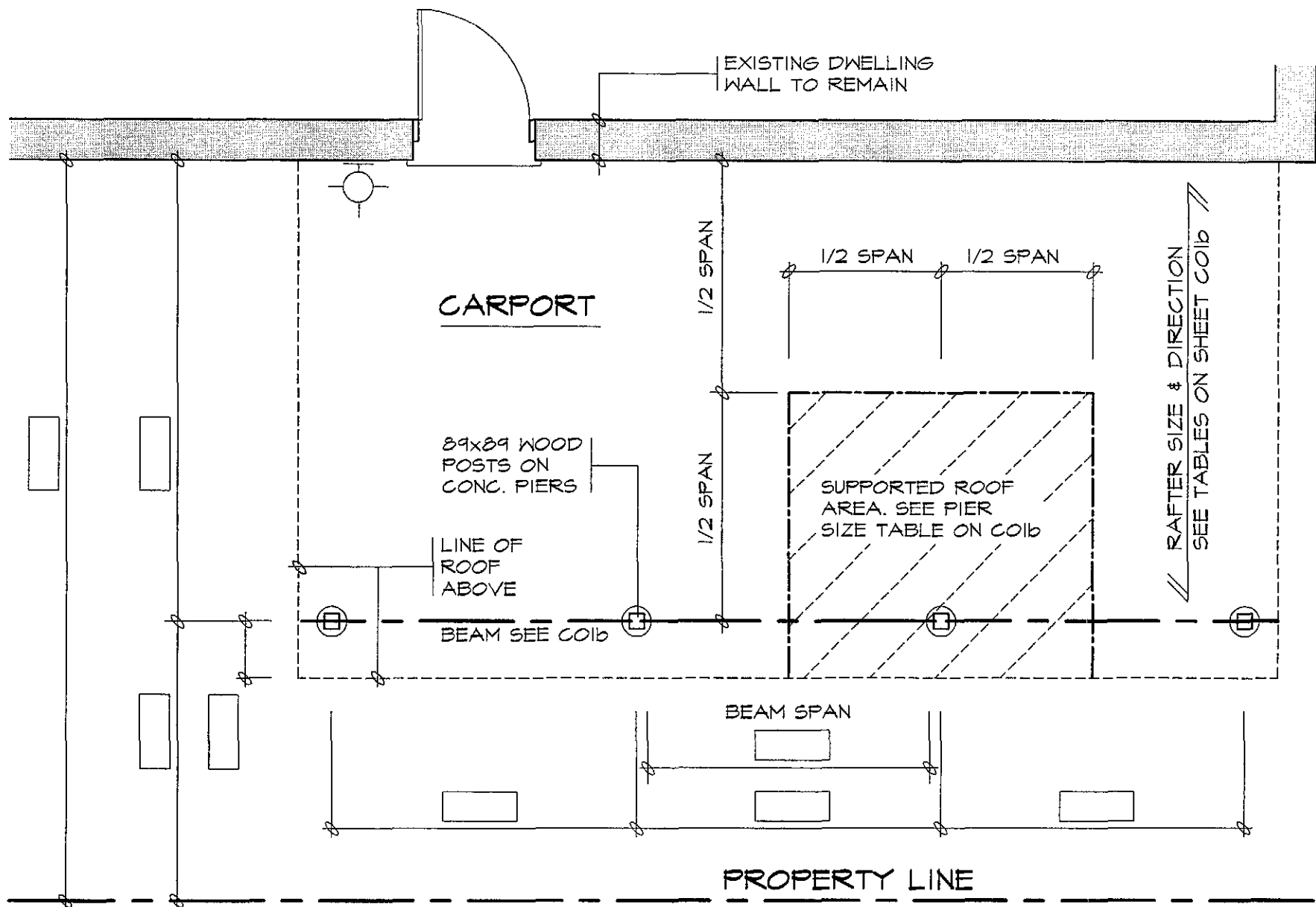


## SITE PLAN

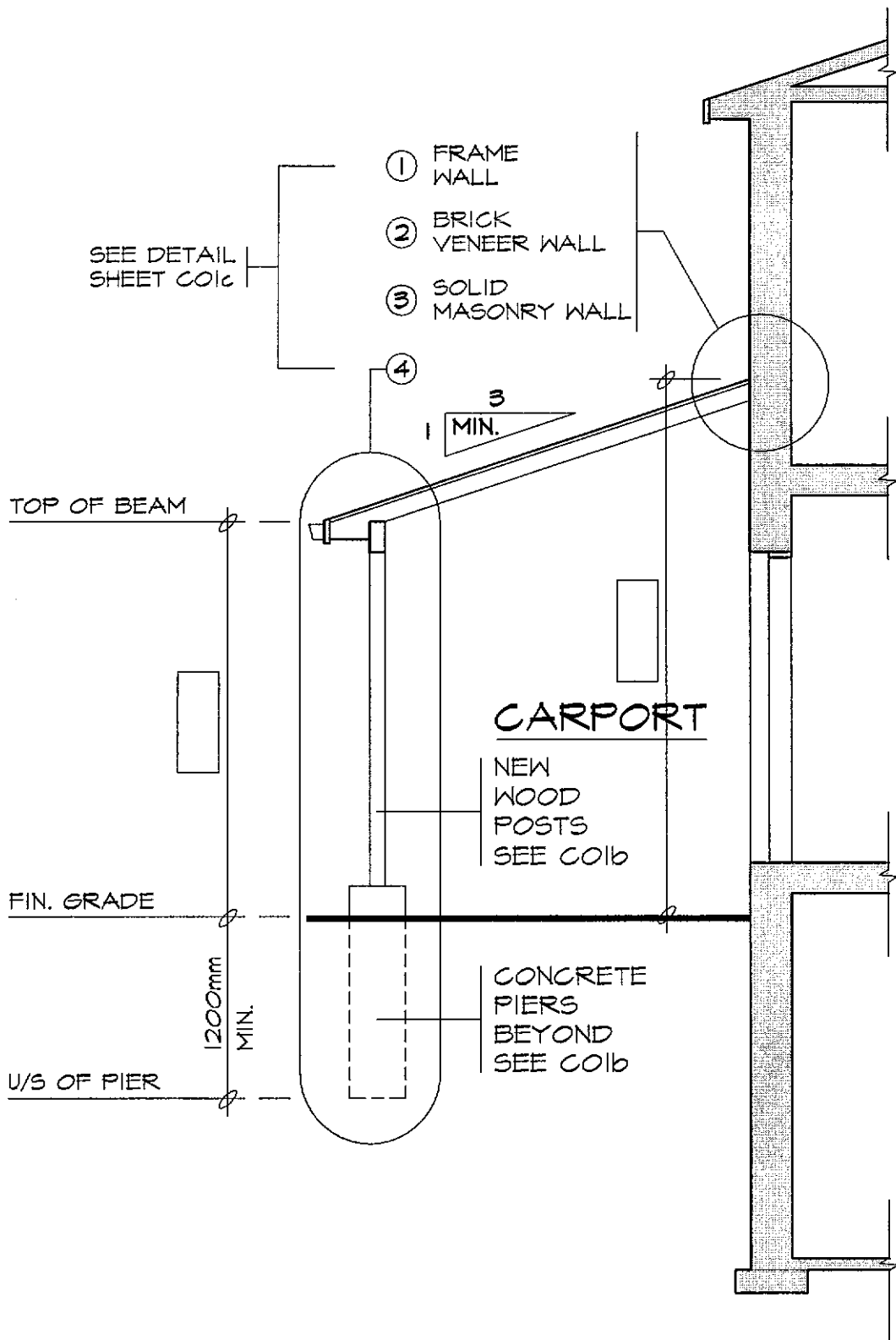
SCALE 1:200

SKETCH OF SURVEY OF  
 LOT 9  
 REG'D PLAN 4220  
 CITY OF TORONTO  
 B.C. TRANSIT. O.L.S.  
 DECEMBER 31ST, 1999

CRESCENT



CARPORT PLAN (PROVIDE DIMENSIONS IN BOXES)



SLOPING ROOF

- ① FRAME WALL
- ② BRICK VENEER WALL
- ③ SOLID MASONRY WALL

④  
3  
1 MIN.

TOP OF BEAM

CARPORT

NEW WOOD POSTS  
SEE CO1b

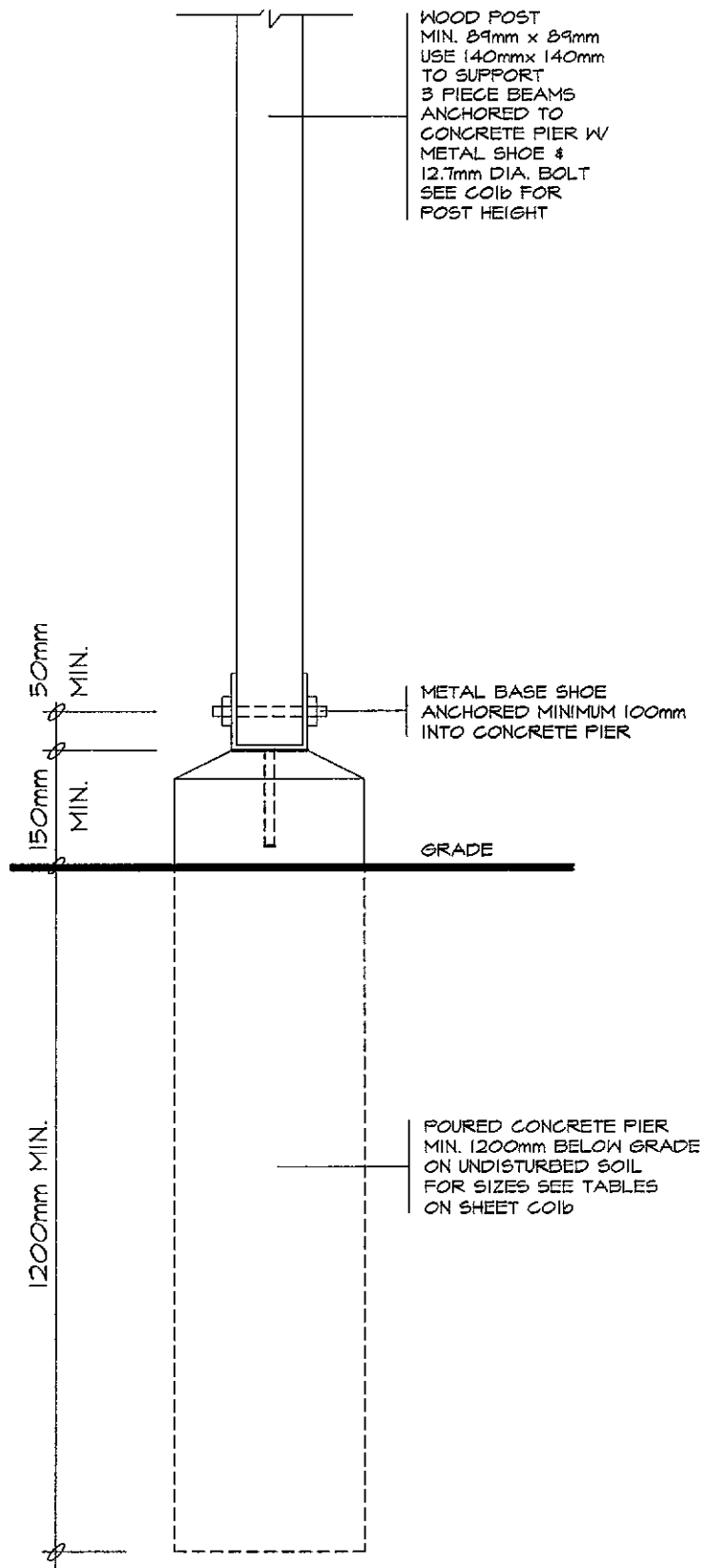
FIN. GRADE

CONCRETE PIERS  
BEYOND  
SEE CO1b

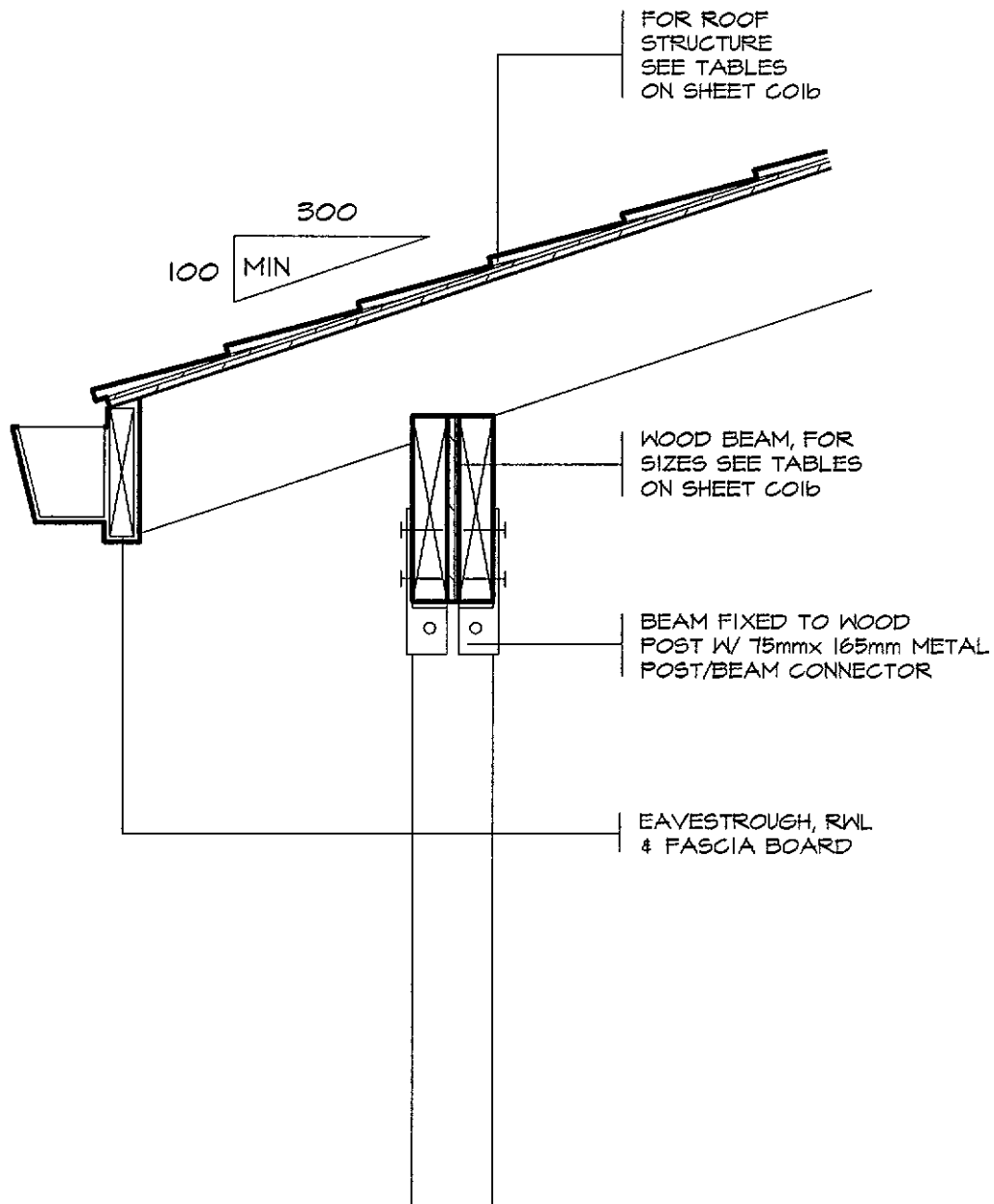
1200mm  
MIN.

U/S OF PIER

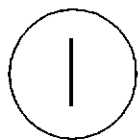
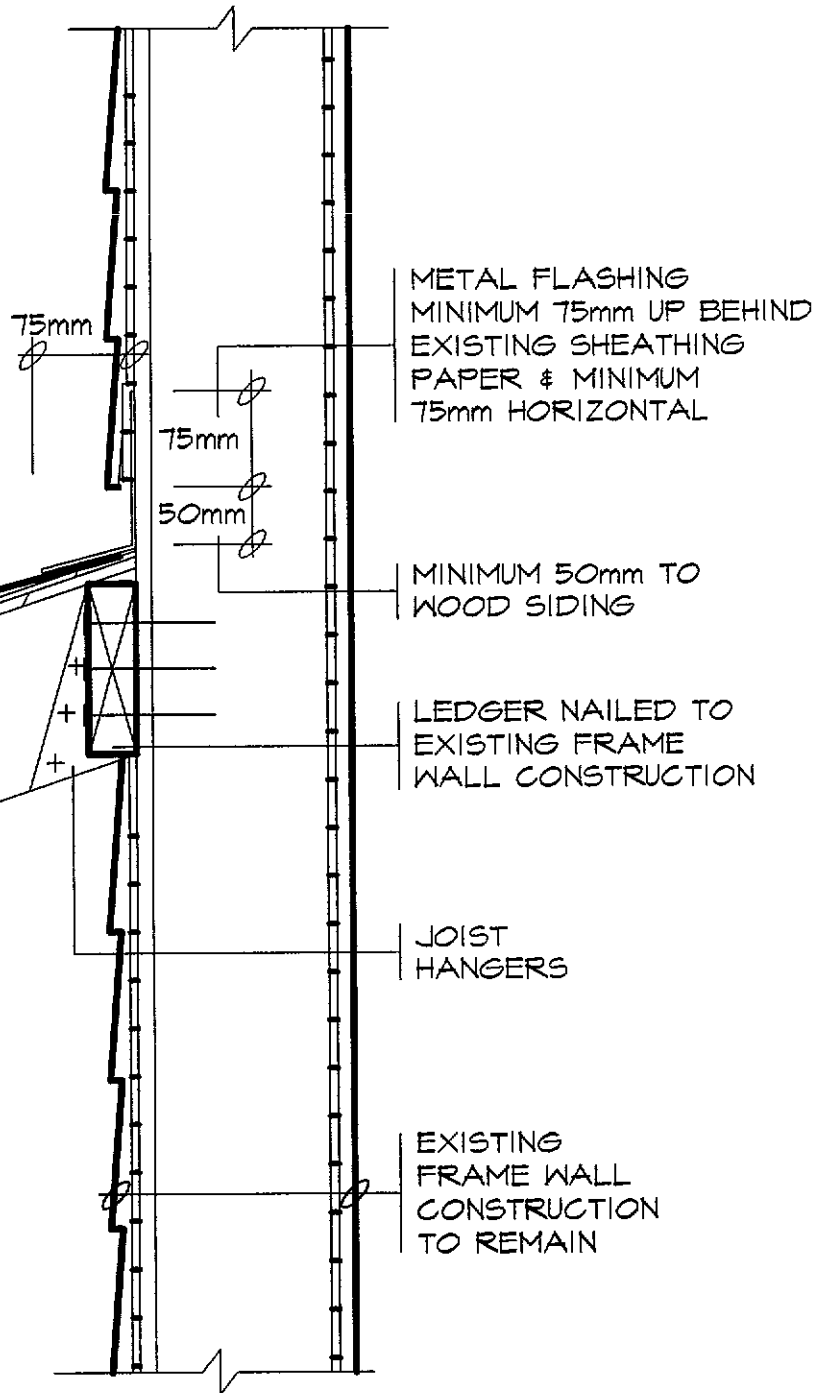
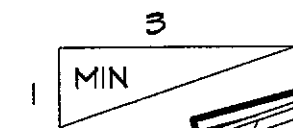
SEE DETAIL SHEET CO1c



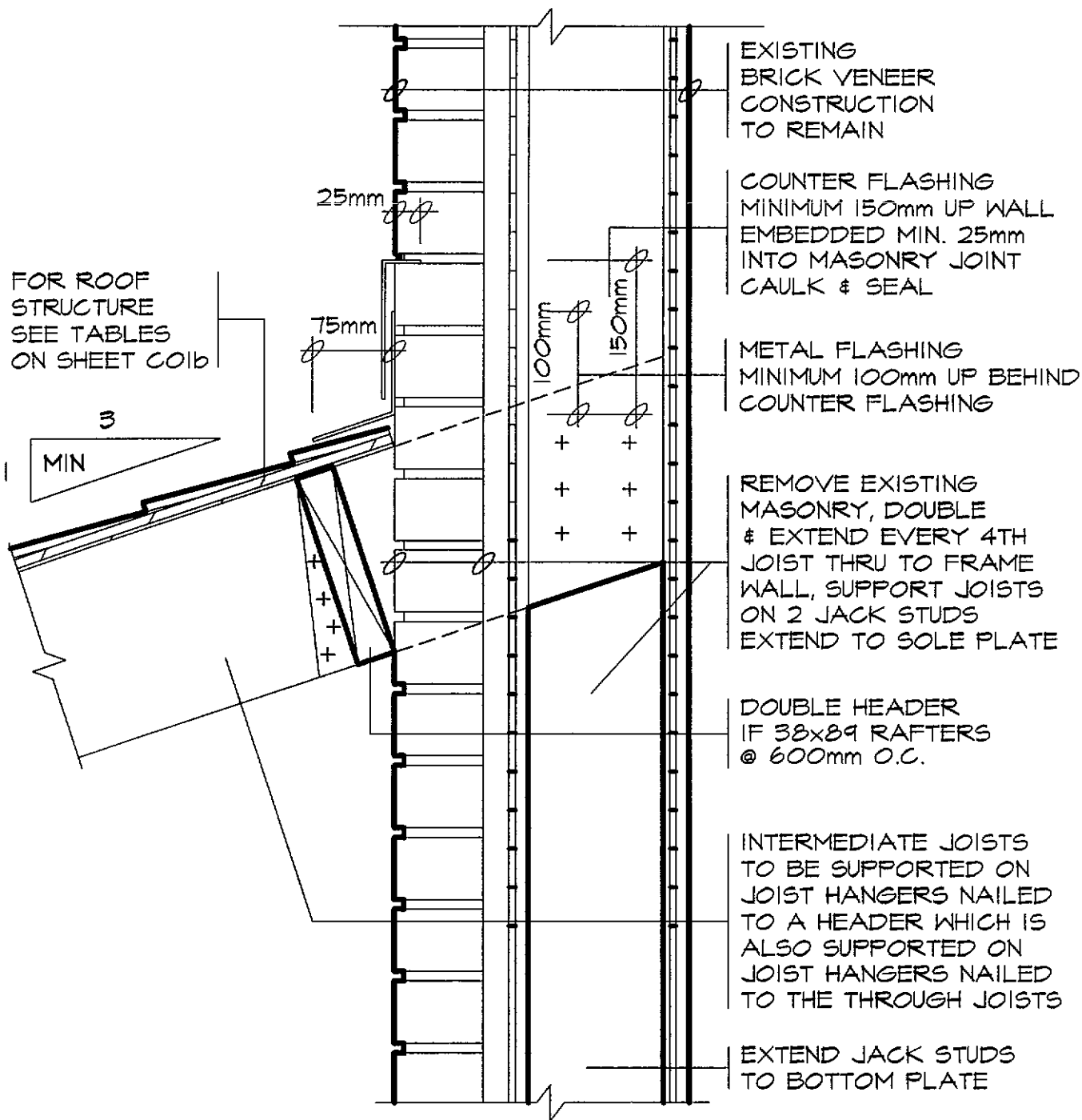
4 SUPPORT DETAIL



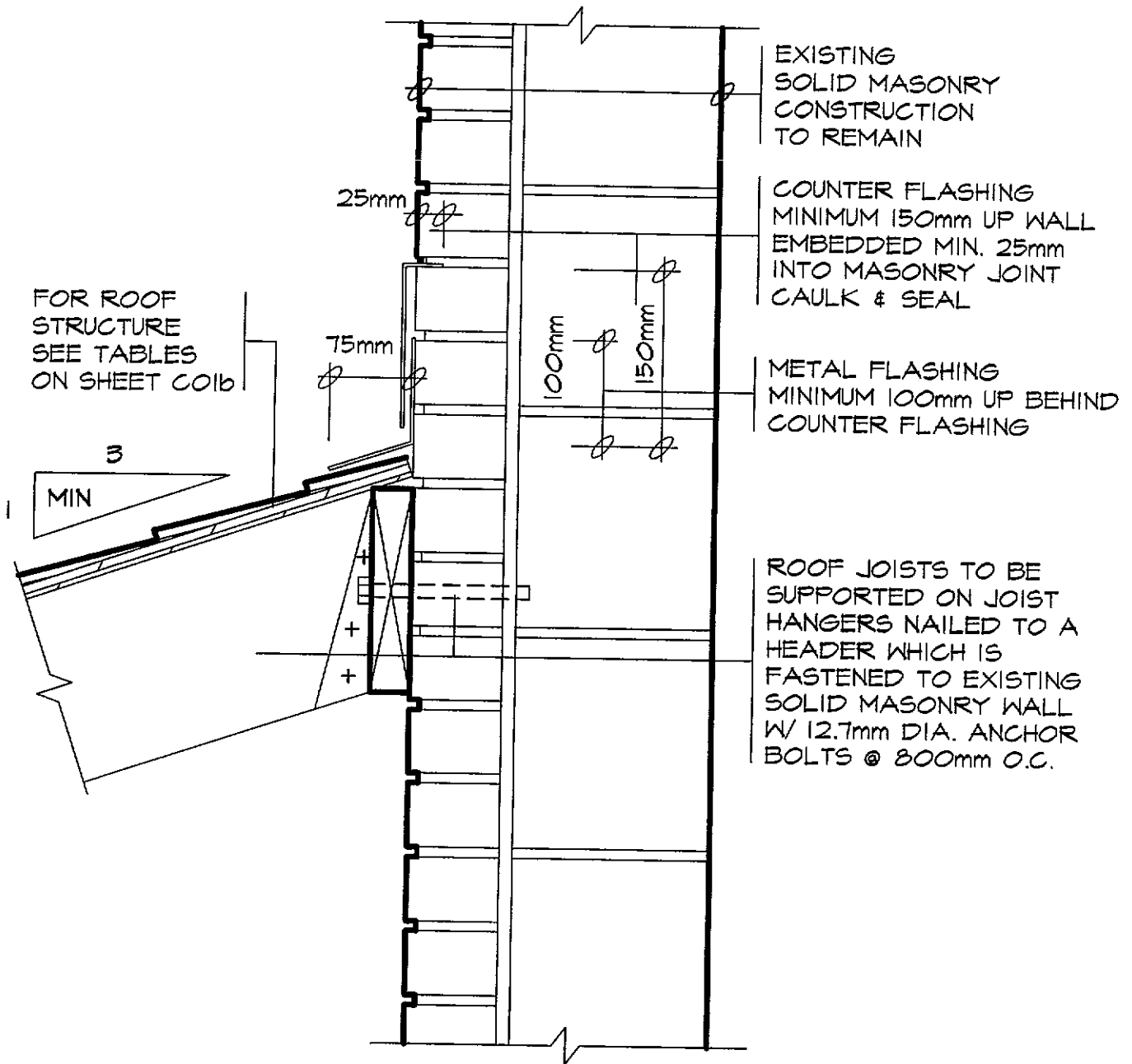
FOR ROOF  
STRUCTURE  
SEE TABLES  
ON SHEET CO1b



# FRAME WALL



2 BRICK VENEER WALL



**3** SOLID MASONRY WALL

## ROOF RAFTERS

(WHERE NO CEILING IS INSTALLED)

MAXIMUM CLEAR SPAN (M)						
RAFTER SIZE	ROOF SNOW LOAD 1.0kPa			ROOF SNOW LOAD 1.5kPa		
	RAFTER SPACING (mm) O.C.			RAFTER SPACING (mm) O.C.		
	300	400	600	300	400	600
38x89	3.11	2.83	2.47	2.72	2.47	2.16
38x140	4.90	4.45	3.89	4.28	3.89	3.40
38x184	6.44	5.85	5.11	5.62	5.11	4.41
38x235	8.22	7.47	6.38	7.18	6.52	5.39

## ROOF JOISTS

(WHERE CEILING IS INSTALLED)

MAXIMUM CLEAR SPAN (M)						
JOIST SIZE	ROOF SNOW LOAD 1.0kPa			ROOF SNOW LOAD 1.5kPa		
	JOIST SPACING (mm) O.C.			JOIST SPACING (mm) O.C.		
	300	400	600	300	400	600
38x89	2.47	2.24	1.96	2.16	1.96	1.71
38x140	3.89	3.53	3.08	3.40	3.08	2.69
38x184	5.11	4.64	4.05	4.46	4.05	3.54
38x235	6.52	5.93	5.18	5.70	5.18	4.52

## ROOFING

ROOF FRAMING (mm) O.C.	ROOF SHEATHING
RAFTERS @ 300	7.5mm PLYWOOD W/ H-CLIPS OR 17mm LUMBER
RAFTERS @ 400	
RAFTERS @ 600	9.5mm PLYWOOD W/ 'H'-CLIPS OR 19mm LUMBER

## BEAMS

MAXIMUM CLEAR SPAN (M)		MINIMUM BEAM SIZE
ROOF SNOW LOAD		
1.0kPa	1.5kPa	
2.35	2.02	2 - 38x184
2.88	2.47	2 - 38x235
3.34	2.87	2 - 38x286

## PIERS

PIER SIZE (mm)	SUPPORTED ROOF AREA (M2)					
	ROOF SNOW LOAD 1.0kPa			ROOF SNOW LOAD 1.5kPa		
	ALLOWABLE BEARING CAPACITY OF SOIL			ALLOWABLE BEARING CAPACITY OF SOIL		
	75kPa	120kPa	190kPa	75kPa	120kPa	190kPa
200 DIA.	1.95	3.25	5.48	1.39	2.32	3.62
250 DIA.	3.07	5.11	8.08	2.14	3.62	5.76
300 DIA.	4.37	7.34	11.71	3.16	5.20	8.36
350 DIA.	5.95	9.94	15.87	4.27	7.06	11.33
400 DIA.	7.62	13.01	20.72	5.48	9.29	14.77

## POSTS

POST SIZE (mm) (SEE NOTE 5)	MAX. HEIGHT (M)	SUPPORTED ROOF AREA (M <sup>2</sup> )				
		ROOF SNOW LOAD (kPa)				
		1.0	1.5	2.0	2.5	3.0
89x89	1.0	17.19	12.98	10.43	8.71	7.48
	1.5	9.39	7.09	5.69	4.76	4.09
	2.0	4.98	3.76	3.02	2.53	2.17
140x140	2.0	21.65	16.35	13.13	10.98	9.43
	2.5	14.77	11.15	8.96	7.48	6.43
	3.0	10.06	7.60	6.10	5.10	4.38
	3.5	6.98	5.27	4.23	3.54	3.04

## GENERAL NOTES

1. ALL LUMBER TO BE NO. 1&2 SPF OR BETTER
2. ALL PLYWOOD SHALL BE STAMPED EXTERIOR GRADE
3. WHERE SUPPORTED ROOF AREAS EXCEED THOSE LISTED IN THIS TABLE, THE POSTS SHALL BE BRACED AS SHOWN IN D01c.
4. WOOD POSTS TO BE MINIMUM 89mmx89mm
5. BEARING CAPACITY OF SOIL SHALL BE CONFIRMED PRIOR TO CONSTRUCTION.