



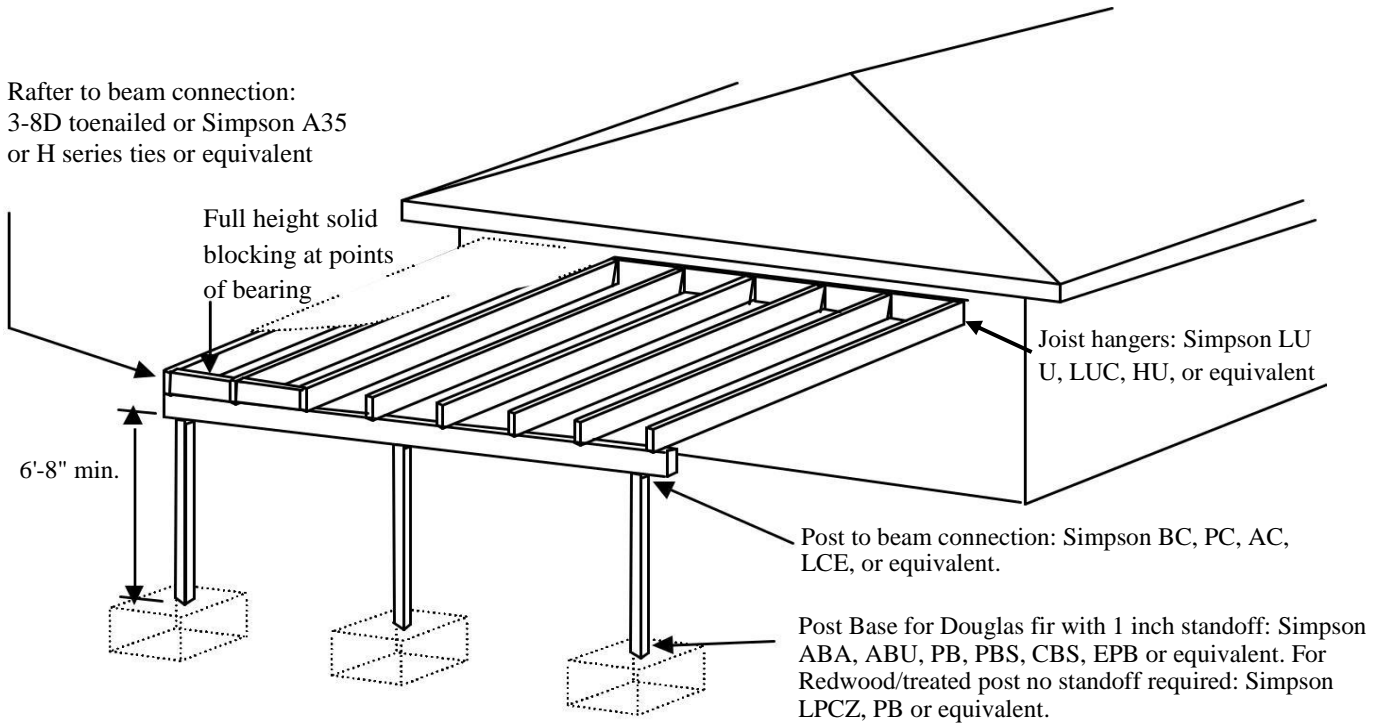
**City of El Cajon**  
**Building and Fire Safety Division**  
 200 Civic Center Way  
 El Cajon, CA 92020  
 Phone: (619) 441-1726

## RESIDENTIAL PATIO DETAIL

Step 1. Draw a plot plan showing the dimensions of the property, all structures on the property, the proposed patio cover, and distances to property lines (an example of a plot plan is available upon request).

Step 2. Use this residential patio cover detail to determine the size of rafters, beams and footings for your patio structure. If existing slab indicate thickness, min 3 1/2" required. Show ledger attachment details.

Step 3. Submit three copies of your plot plan along with this detail to the El Cajon Building Division. We'll take it from there!



### General Notes:

1. Minimum height from slab to supporting beam = 6'-8"
2. Minimum compressive strength for concrete is 2000 psi
3. Lumber spans are based on Douglas fir-larch # 2 or better
4. A 1 inch standoff is required for the post base.
5. A maximum 2 foot overhang is anticipated for rafters.

Rafter Spans Dead Load 10 psf				
Rafter Size	Rafter Spacing			
	Spacing	Span	Ledger size	Ledger Attachment
2x4	12"	10'	2x4 min.	3/8x5 lag@ 24" o.c. max
	16"	9'		
	24"	8'		
2x6	12"	17'	2x6 min.	1/2x5 lag@ 20" o.c. max.
	16"	15'		
	24"	12'		
2x8	12"	21'	2x8 min.	1/2x5 lag@ 16" o.c. max.
	16"	18'		
	24"	15'		

Beam Span						
Rafter Span	Post Spacing					
	6	8	10	12	14	16
6	4x4	4x4	4x6	4x6	4x8	4x8
8	4x4	4x6	4x6	4x6	4x8	4x8
10	4x4	4x6	4x6	4x8	4x8	4x10
12	4x4	4x6	4x6	4x8	4x8	4x10
14	4x4	4x6	4x6	4x8	4x10	4x10
16	4x4	4x8	4x8	4x8	4x10	4x12
18	4x4	4x8	4x8	4x8	4x10	4x114

Minimum Square Footing Width in Inches							
Post Spacing	Rafter Span in Feet (-no footing required)						
	6	8	10	12	14	16	18
6	-	-	-	-	12	12	12
8	-	-	12	12	12	14	14
10	-	12	12	14	14	14	14
12	-	12	14	14	14	14	16
14	12	12	14	14	14	16	16
16	12	14	14	14	16	16	18