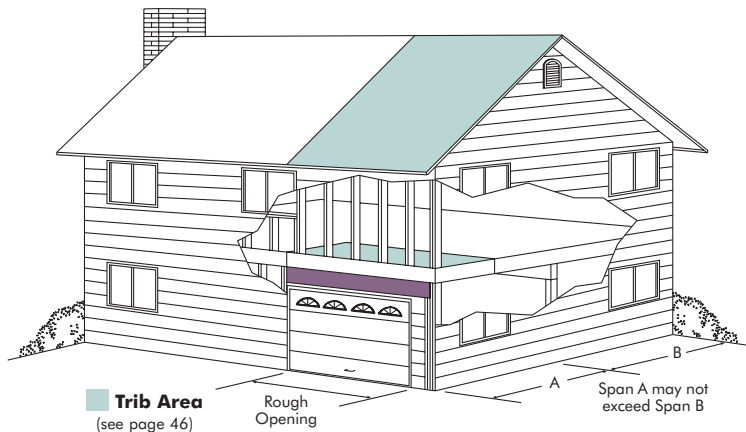


2-STORY GARAGE DOOR HEADERS

This table considers the combined loads from a wall, second story floor (¼ of total floor joist span) and various roof truss spans with a 2' soffit. Intermediate floor beam assumed. If the soffit exceeds 2', additional engineering will be necessary.



2-STORY – 1.8E RIGIDLAM LVL

| Roof Loading | Snow (115%) | | | | | | | | | Non-Snow (125%) | | | | | | | | | |
|--|-----------------------|--------|--------|-----------------------|--------|--------|-----------------------|--------|--------|-----------------------|--------|--------|-----------------------|--------|--------|-----------------------|--------|--------|--------|
| | 25 psf LL + 20 psf DL | | | 30 psf LL + 20 psf DL | | | 40 psf LL + 20 psf DL | | | 20 psf LL + 15 psf DL | | | 20 psf LL + 20 psf DL | | | 20 psf LL + 25 psf DL | | | |
| Rough Opening | 9' 3" | 16' 3" | 18' 3" | 9' 3" | 16' 3" | 18' 3" | 9' 3" | 16' 3" | 18' 3" | 9' 3" | 16' 3" | 18' 3" | 9' 3" | 16' 3" | 18' 3" | 9' 3" | 16' 3" | 18' 3" | |
| Roof Truss Span with 2' Soffit Assumed | 20' | 2-9½" | 2-16" | 2-18"+ | 2-9½" | 2-16"+ | 2-18"+ | 2-9½" | 2-18"+ | - | 2-9½" | 2-16" | 2-18" | 2-9½" | 2-16" | 2-18"+ | 2-9½" | 2-16" | 2-18"+ |
| | | 3-9½" | 3-14" | 3-16" | 3-9½" | 3-14" | 3-16" | 3-9½" | 3-16" | 3-16" | 3-9½" | 3-14" | 3-16" | 3-9½" | 3-14" | 3-16" | 3-9½" | 3-14" | 3-16" |
| | 24' | 2-9½" | 2-16"+ | 2-18"+ | 2-9½" | 2-18"+ | - | 2-11½" | 2-18"+ | - | 2-9½" | 2-16" | 2-18"+ | 2-9½" | 2-16"+ | 2-18"+ | 2-9½" | 2-16"+ | 2-18"+ |
| | | 3-9½" | 3-14" | 3-16" | 3-9½" | 3-16" | 3-16" | 3-9½" | 3-16" | 3-18"+ | 3-9½" | 3-14" | 3-16" | 3-9½" | 3-14" | 3-16" | 3-9½" | 3-14" | 3-16" |
| | 28' | 2-11½" | 2-18"+ | - | 2-11½" | 2-18"+ | - | 2-11½" | - | - | 2-9½" | 2-16"+ | 2-18"+ | 2-9½" | 2-18"+ | - | 2-11½" | 2-18"+ | - |
| 3-9½" | | 3-16" | 3-18" | 3-9½" | 3-16" | 3-18"+ | 3-9½" | 3-16"+ | 3-18"+ | 3-9½" | 3-14" | 3-16" | 3-9½" | 3-16" | 3-16" | 3-9½" | 3-16" | 3-18" | |
| 32' | 2-11½" | 2-18"+ | - | 2-11½" | - | - | 2-11½" | - | - | 2-9½" | 2-18"+ | - | 2-11½" | 2-18"+ | - | 2-11½" | 2-18"+ | - | |
| | 3-9½" | 3-16" | 3-18"+ | 3-9½" | 3-16"+ | 3-18"+ | 3-9½" | 3-16"+ | - | 3-9½" | 3-16" | 3-16" | 3-9½" | 3-16" | 3-18"+ | 3-9½" | 3-16" | 3-18"+ | |
| 36' | 2-11½" | - | - | 2-11½" | - | - | 2-11½" | - | - | 2-11½" | 2-18"+ | - | 2-11½" | 2-11½" | - | 2-11½" | - | - | |
| | 3-9½" | 3-16"+ | 3-18"+ | 3-9½" | 3-16"+ | 3-18"+ | 3-9½" | 3-18"+ | - | 3-9½" | 3-16" | 3-18"+ | 3-9½" | 3-16"+ | 3-18"+ | 3-9½" | 3-16"+ | 3-18"+ | |

2-STORY – 2.0E RIGIDLAM LVL

| Roof Loading | Snow (115%) | | | | | | | | | Non-Snow (125%) | | | | | | | | | |
|--|-----------------------|--------|--------|-----------------------|--------|--------|-----------------------|--------|--------|-----------------------|--------|--------|-----------------------|--------|--------|-----------------------|--------|--------|--------|
| | 25 psf LL + 20 psf DL | | | 30 psf LL + 20 psf DL | | | 40 psf LL + 20 psf DL | | | 20 psf LL + 15 psf DL | | | 20 psf LL + 20 psf DL | | | 20 psf LL + 25 psf DL | | | |
| Rough Opening | 9' 3" | 16' 3" | 18' 3" | 9' 3" | 16' 3" | 18' 3" | 9' 3" | 16' 3" | 18' 3" | 9' 3" | 16' 3" | 18' 3" | 9' 3" | 16' 3" | 18' 3" | 9' 3" | 16' 3" | 18' 3" | |
| Roof Truss Span with 2' Soffit Assumed | 20' | 2-9½" | 2-16" | 2-18"+ | 2-9½" | 2-16" | 2-18"+ | 2-9½" | 2-16"+ | 2-18"+ | 2-9½" | 2-14" | 2-16" | 2-9½" | 2-16" | 2-16" | 2-9½" | 2-16" | 2-18"+ |
| | | 3-9½" | 3-14" | 3-16" | 3-9½" | 3-14" | 3-16" | 3-9½" | 3-14" | 3-16" | 3-9½" | 3-14" | 3-14" | 3-9½" | 3-14" | 3-14" | 3-9½" | 3-14" | 3-16" |
| | 24' | 2-9½" | 2-16"+ | 2-18"+ | 2-9½" | 2-16"+ | 2-18"+ | 2-9½" | 2-18"+ | - | 2-9½" | 2-16" | 2-18"+ | 2-9½" | 2-16"+ | 2-18"+ | 2-9½" | 2-16"+ | 2-18"+ |
| | | 3-9½" | 3-14" | 3-16" | 3-9½" | 3-14" | 3-16" | 3-9½" | 3-16" | 3-16" | 3-9½" | 3-14" | 3-16" | 3-9½" | 3-14" | 3-16" | 3-9½" | 3-14" | 3-16" |
| | 28' | 2-9½" | 2-16"+ | - | 2-9½" | 2-18"+ | - | 2-11½" | 2-18"+ | - | 2-9½" | 2-16"+ | 2-18"+ | 2-9½" | 2-16"+ | 2-18"+ | 2-9½" | 2-16"+ | 2-18"+ |
| 3-9½" | | 3-14" | 3-16" | 3-9½" | 3-16" | 3-16" | 3-9½" | 3-16" | 3-18"+ | 3-9½" | 3-14" | 3-16" | 3-9½" | 3-14" | 3-16" | 3-9½" | 3-14" | 3-16" | |
| 32' | 2-11½" | 2-18"+ | - | 2-11½" | 2-18"+ | - | 2-11½" | - | - | 2-9½" | 2-16"+ | 2-18"+ | 2-9½" | 2-18"+ | - | 2-11½" | 2-18"+ | - | |
| | 3-9½" | 3-16" | 3-18"+ | 3-9½" | 3-16" | 3-18"+ | 3-9½" | 3-16"+ | 3-18"+ | 3-9½" | 3-14" | 3-16" | 3-9½" | 3-16" | 3-16" | 3-9½" | 3-16" | 3-18"+ | |
| 36' | 2-11½" | 2-18"+ | - | 2-11½" | - | - | 2-11½" | - | - | 2-9½" | 2-18"+ | - | 2-11½" | 2-18"+ | - | 2-11½" | 2-18"+ | - | |
| | 3-9½" | 3-16"+ | 3-18"+ | 3-9½" | 3-16"+ | 3-18"+ | 3-9½" | 3-16"+ | 3-18"+ | 3-9½" | 3-16" | 3-16" | 3-9½" | 3-16" | 3-18"+ | 3-9½" | 3-16"+ | 3-18"+ | |

+ see note 3

Notes:

- Header sizes are listed as the number of 1¾" thick pieces by the header depth. e.g. 2-9½" indicates two 1¾" pieces by 9½" deep.
- Header sizes are based on the assumption that the floor joists are supported in the middle of the building by a beam or wall.
- The minimum required bearing length (based on 700 psi) is 3" unless the + symbol is shown. In that case, 4½" is required.
- All headers require support across their full width. Use 2x4 cripples for two piece headers and 2x6 cripples for three piece headers.
- Header sizes are based on residential floor loading of 40 psf live load and 10 psf dead load. The roof framing must be trusses supported by the exterior walls only.
- Deflection is limited to L/360 at live load and L/240 at total load.