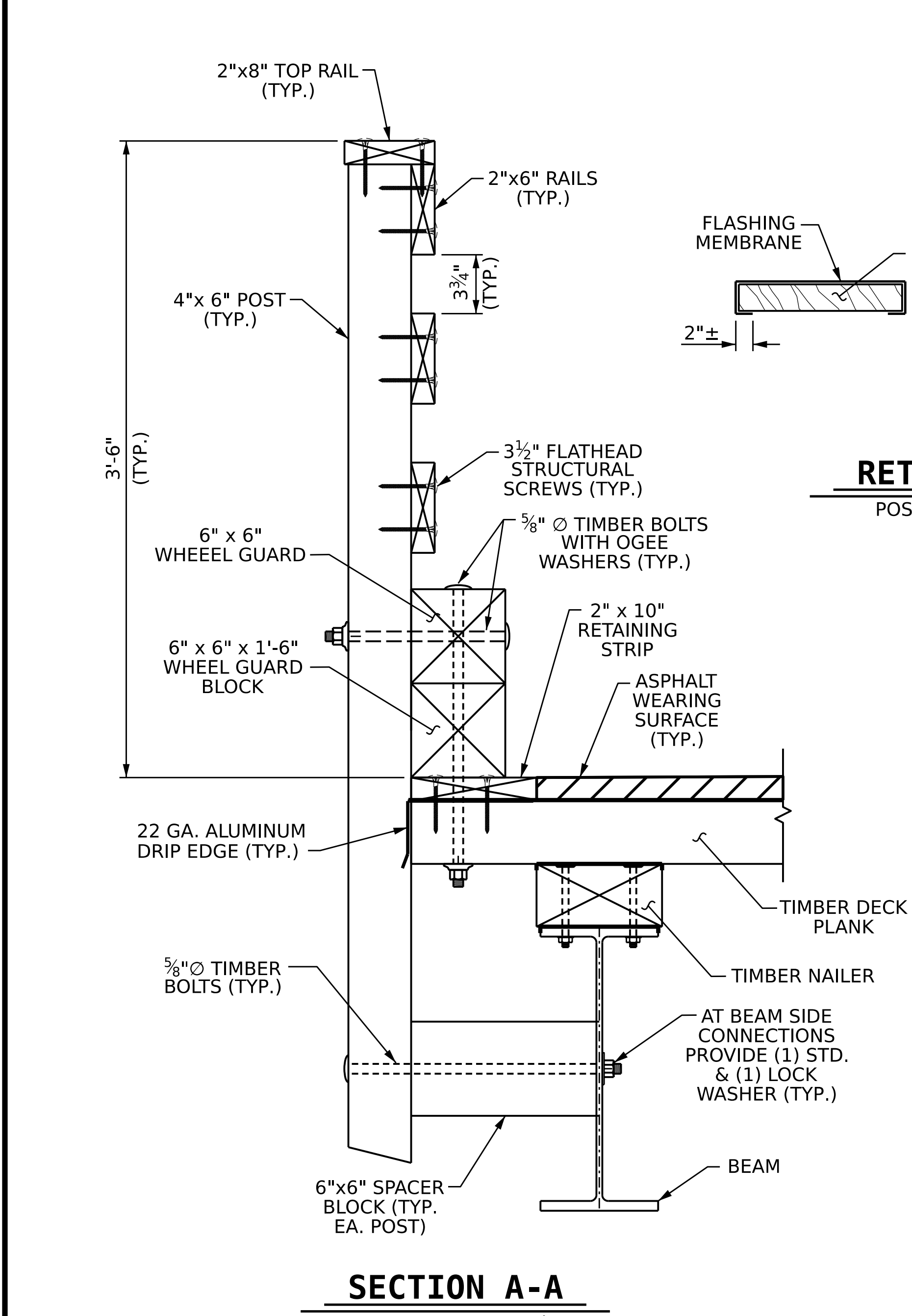
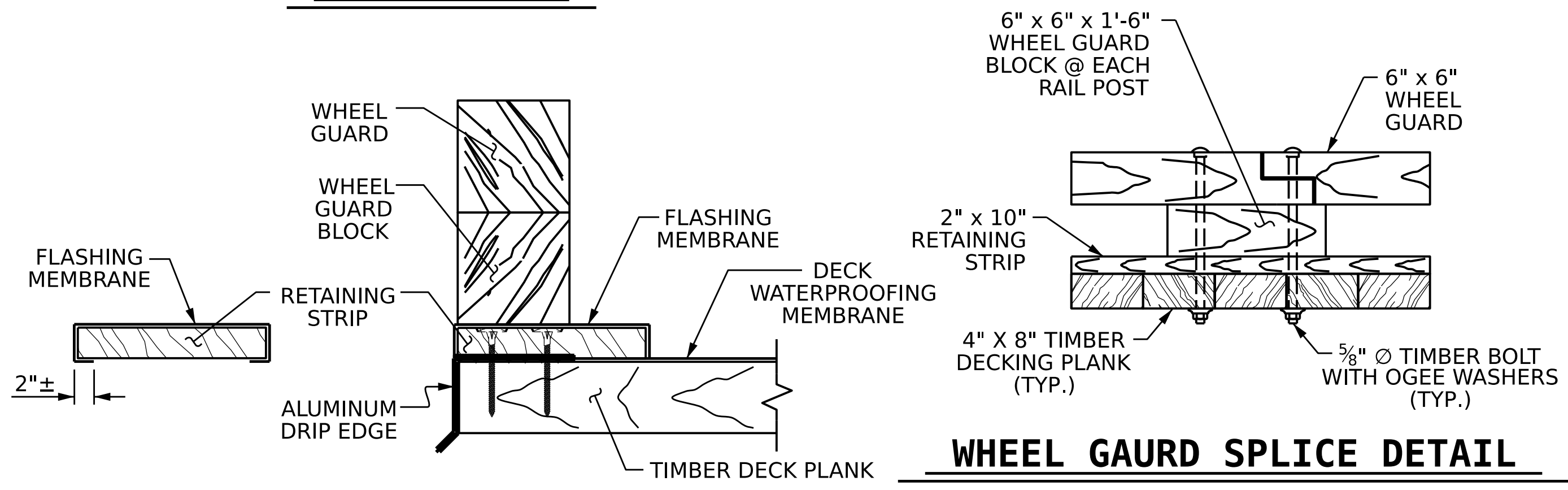


ELEVATION



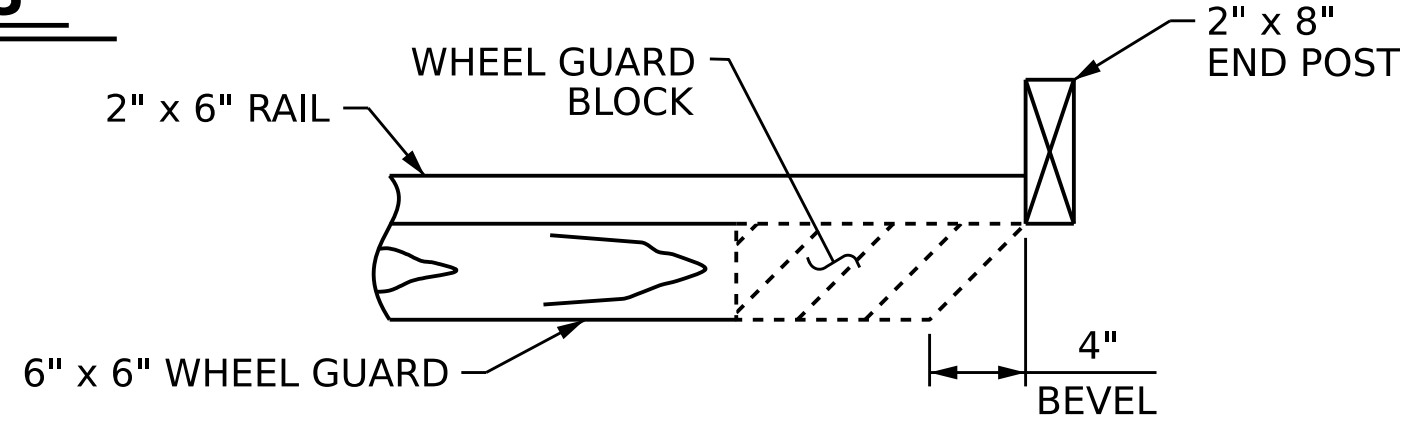
SECTION A-A



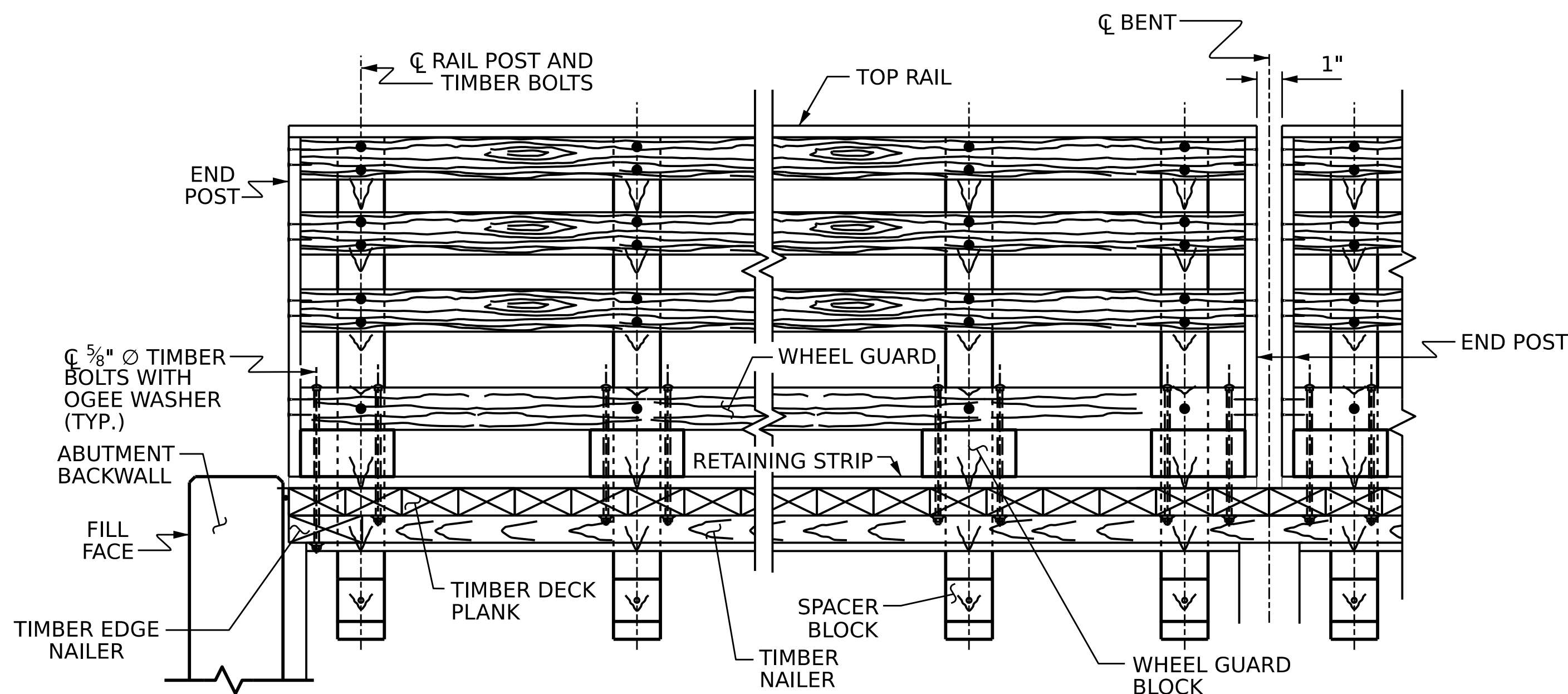
WHEEL GAURD SPLICE DETAIL

RETAINING STRIP DETAILS

POST AND BOLTS NOT SHOWN FOR CLARITY



VIEW B-B



RAIL DETAIL AT ABUTMENTS

RAIL DETAIL AT EXISTING BENTS

BILL OF MATERIAL FOR ONE RAIL (2 REQ.D)

| | SPAN 'A' | | SPAN 'B' | | SPAN 'C' | |
|-----------------------------|-------------------|----------|-------------------|----------|-------------------|----------|
| TREATED LUMBER | | | | | | |
| ITEM | SIZE | LIN. FT. | SIZE | LIN. FT. | SIZE | LIN. FT. |
| RAILS | 2"x 6" | 109.38 | 2"x 6" | 116.50 | 2"x 6" | 124.88 |
| RAIL POSTS | 4"x6" | 54.00 | 4"x6" | 54.00 | 4"x6" | 54.00 |
| TOP RAIL | 2"x8" | 36.71 | 2"x8" | 39.08 | 2"x8" | 41.88 |
| WHEEL GUARD | 6"x6" | 36.46 | 6"x6" | 38.83 | 6"x6" | 41.63 |
| WHEEL GUARD BLOCK | 6"x6" | 13.50 | 6"x6" | 13.50 | 6"x6" | 13.50 |
| END POSTS | 2"x8" | 7.0 | 2"x8" | 7.0 | 2"x8" | 7.0 |
| SPACER BLOCK | 6"x6" | 11.25 | 6"x6" | 11.25 | 6"x6" | 11.25 |
| HARDWARE | | | | | | |
| ITEM | No. | SIZE | LBS. | No. | SIZE | LBS. |
| TIMBER BOLTS (WHEEL GUARD) | 9 | 5/8" Ø | 12.6 | 9 | 5/8" Ø | 12.6 |
| TIMBER BOLTS (SPACER BLOCK) | 9 | 5/8" Ø | 20.7 | 9 | 5/8" Ø | 20.7 |
| TIMBER BOLTS (RAIL) | 18 | 5/8" Ø | 41.4 | 18 | 5/8" Ø | 41.4 |
| HEAVY HEX NUTS | 36 | 5/8" Ø | 4.3 | 36 | 5/8" Ø | 4.3 |
| FLATHEAD STR. SCREWS | 100 | 3 1/2" | 2.0 | 100 | 3 1/2" | 2.0 |
| STANDARD WASHER | 9 | 5/8" Ø | 1.0 | 9 | 5/8" Ø | 1.0 |
| LOCK WASHER | 9 | 5/8" Ø | 1.0 | 9 | 5/8" Ø | 1.0 |
| OGEE WASHERS | 27 | 5/8" Ø | 16.7 | 27 | 5/8" Ø | 16.7 |
| HARDWARE FOR CONNECTIONS | APPROX. 99.7 LBS. | | APPROX. 99.7 LBS. | | APPROX. 99.7 LBS. | |
| PAY LENGTH = | 36.7 LIN. FT. | | 39.1 LIN. FT. | | 41.9 LIN. FT. | |

NOTES

THE TIMBER BRIDGE RAIL SYSTEM SHALL NOT BE ATTACHED TO THE TIMBER BRIDGE DECK SYSTEM PRIOR TO THE TIMBER DECK WATERPROOFING MEMBRANE BEING INSTALLED.

BRIDGE RAILS SHALL BE CONTINUOUS FROM END POST TO END POST WITH NO GAPS. RAIL LUMBER LENGTHS SHALL BE ATTACHED TO A MINIMUM OF THREE POSTS.

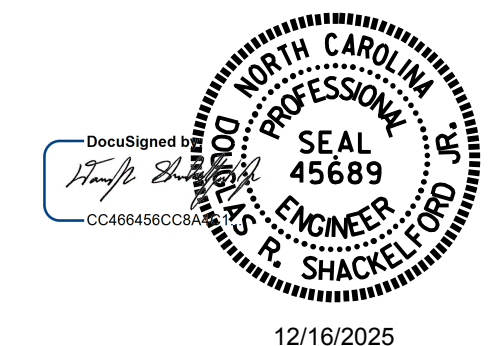
TREAT ALL DRILLED OR NEWLY EXPOSED HOLES IN TIMBER MEMBERS BY PUMPING WITH BITUMINOUS ASPHALT-BASED ROOFING CEMENT, OR APPROVED PRESERVATIVE SYSTEM BEFORE INSTALLING HARDWARE.

SEE PLAN OF SPAN SHEET FOR NUMBER OF POSTS AND POST SPACING.

PROJECT NO. **30001.WIUM.002**
WAKE COUNTY
STATION: **12+87.00 -L1-**

STATE OF NORTH CAROLINA
DEPARTMENT OF TRANSPORTATION
RALEIGH

STANDARD
**TIMBER BRIDGE RAIL
SYSTEM**



| | |
|-----------------------------|----------------|
| ASSEMBLED BY: P.D. BRYANT | DATE : 08/2025 |
| CHECKED BY : D. SHACKELFORD | DATE : 08/2025 |
| DRAWN BY : BNB | 4/24 |
| CHECKED BY : JDH | 10/24 |

*****SYTIME*****
*****DGN*****
*****USERNAME*****

DOCUMENT NOT CONSIDERED
FINAL UNLESS ALL
SIGNATURES COMPLETED

| REVISIONS | | | | SHEET NO. | |
|--------------|-----|-------|-----|-----------|-------|
| NO. | BY: | DATE: | NO. | BY: | DATE: |
| 1 | | | 3 | | |
| 2 | | | 4 | | |
| TOTAL SHEETS | | | | S-14 | |
| | | | | 17 | |