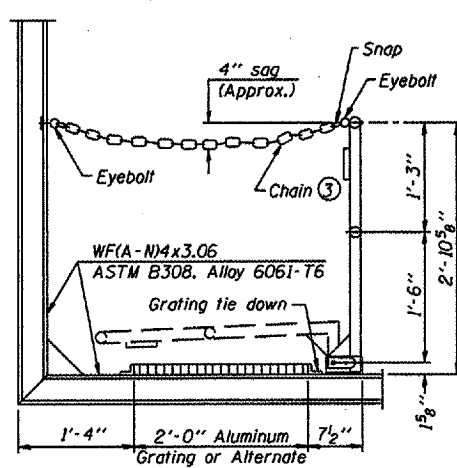
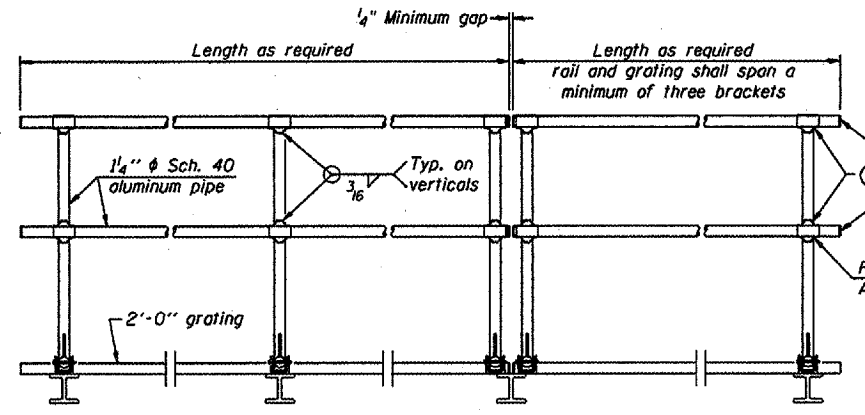


STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

Various Routes
OVD SIN STR REP & REPL 2006-9
Various Counties
Sheet 45 of 89
Contract Number 44904



SIDE ELEVATION
(Showing safety chain w/o sign)

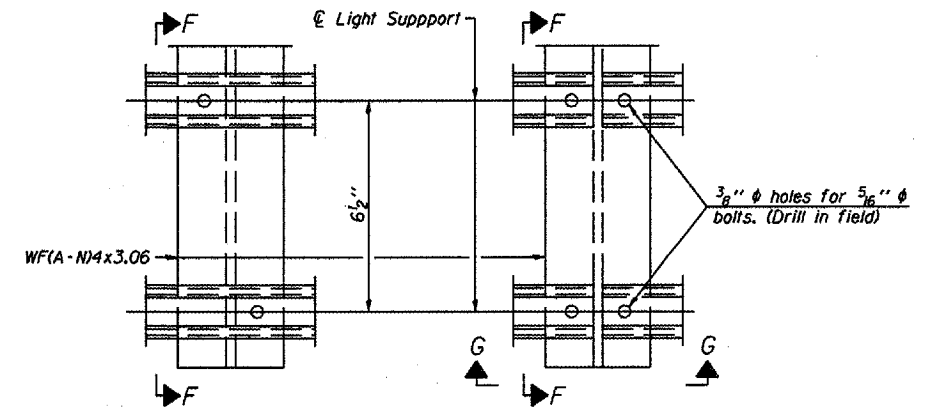


FRONT ELEVATION

HANDRAIL DETAILS

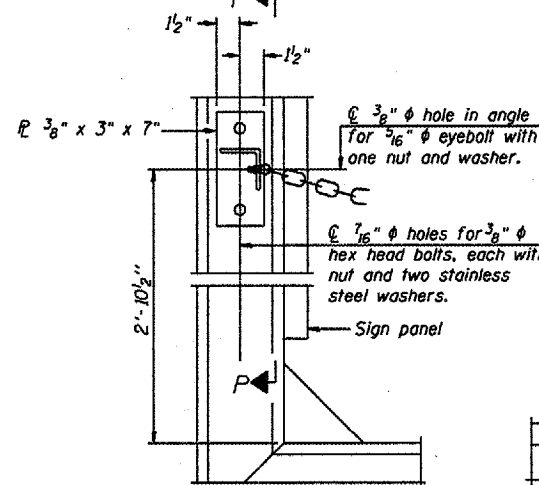
Handrail pipe shall be ASTM B241, Alloy 6063-T6 or Alloy 6061-T6.

- ① Install standard force-fit end caps or weld 1/8" end plates with 1/8" c.f.w. and grind smooth. (All rail ends)
- ② Horizontal handrail member shall be continuous thru fitting. Provide 1/16" hole in fitting for 3/8" bolt. Field drill 1/16" hole in horizontal rail member. Provide locknut and two stainless steel washers for bolt. (Use 5/16" eyebolts in 1/16" holes on top rail at ends only.)

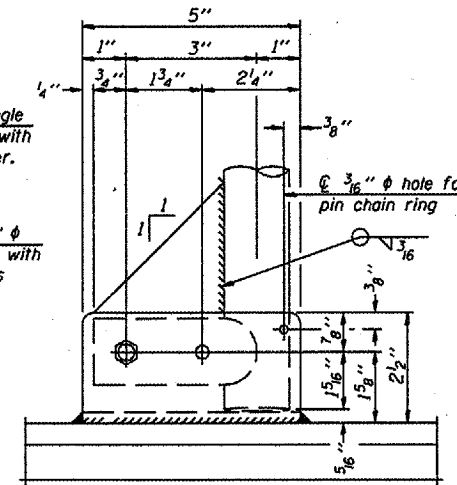


DETAIL F

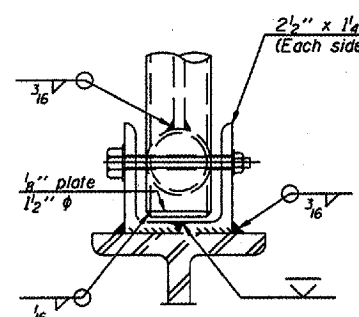
DETAIL G



ALTERNATE SAFETY CHAIN ATTACHMENT
(With Sign Present)
Items not shown same as "Side Elevation" of "Handrail Details"

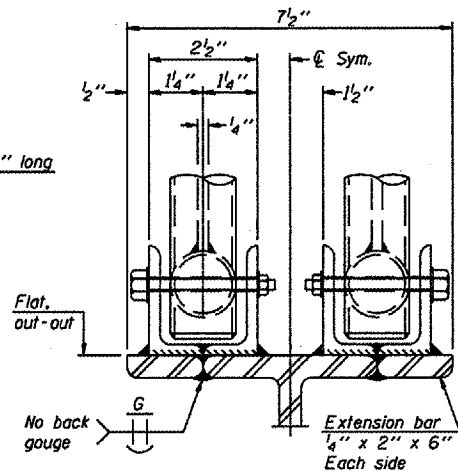


SIDE ELEVATION

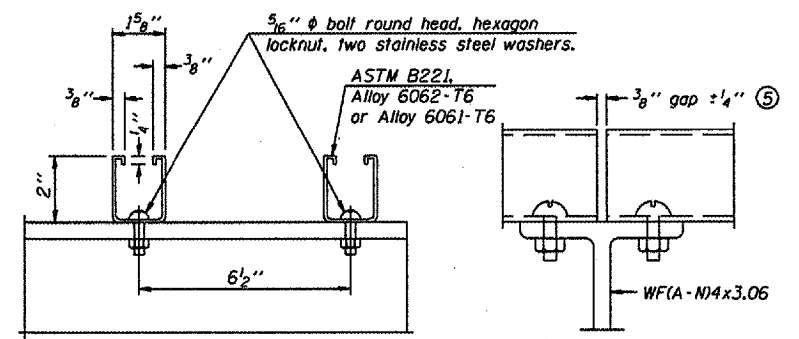


FRONT ELEVATION

See "Elevation" at right for dimensions.



ELEVATION AT HANDRAIL JOINT ④

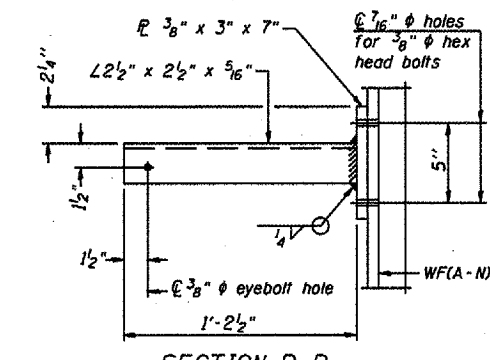


SECTION F-F

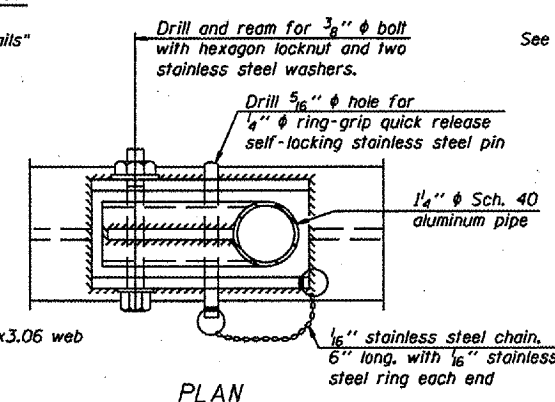
SECTION G-G

LIGHTING FIXTURE MOUNTS (IF REQUIRED)

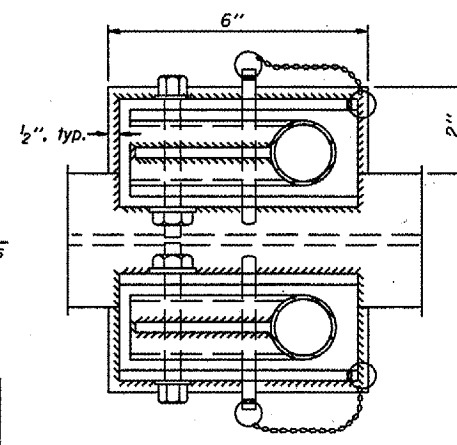
- ⑤ Field cut ends of light support channels shall be free of burrs or hazardous projections and coated with zinc-rich primer or equivalent.



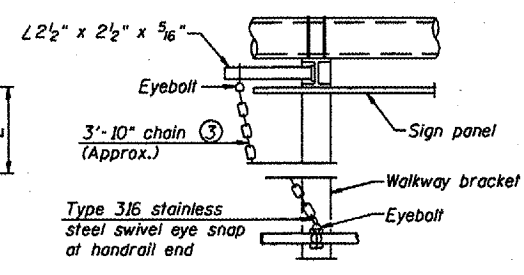
SECTION P-P



PLAN
DETAIL E HANDRAIL HINGE



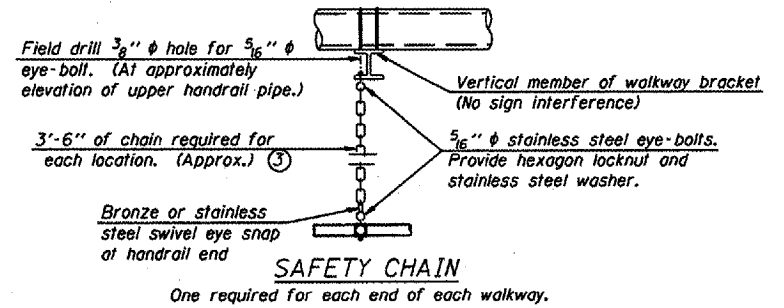
PLAN AT HANDRAIL JOINT
Details not shown same as "PLAN"



ALTERNATE SAFETY CHAIN ATTACHMENT

Details not shown similar to "Safety Chain" Details
(Walkway omitted for clarity)

- ③ 3/16" Type 304L or 316L stainless steel chain, approximately 12 links per foot.
- ④ Extrusions may be used in lieu of the details shown, with approval of the Engineer.



SAFETY CHAIN

One required for each end of each walkway.

This Sheet For Information Only

**OVERHEAD SIGN STRUCTURES
ALUMINUM HANDRAIL DETAILS**

District 4
Overhead Sign Structure
Repair and Replacement

DESIGNED	20
CHECKED	ENGINEER OF BRIDGE DESIGN
DRAWN	ENGINEER OF BRIDGES AND STRUCTURES
CHECKED	

NUMBER	REVISION	DATE