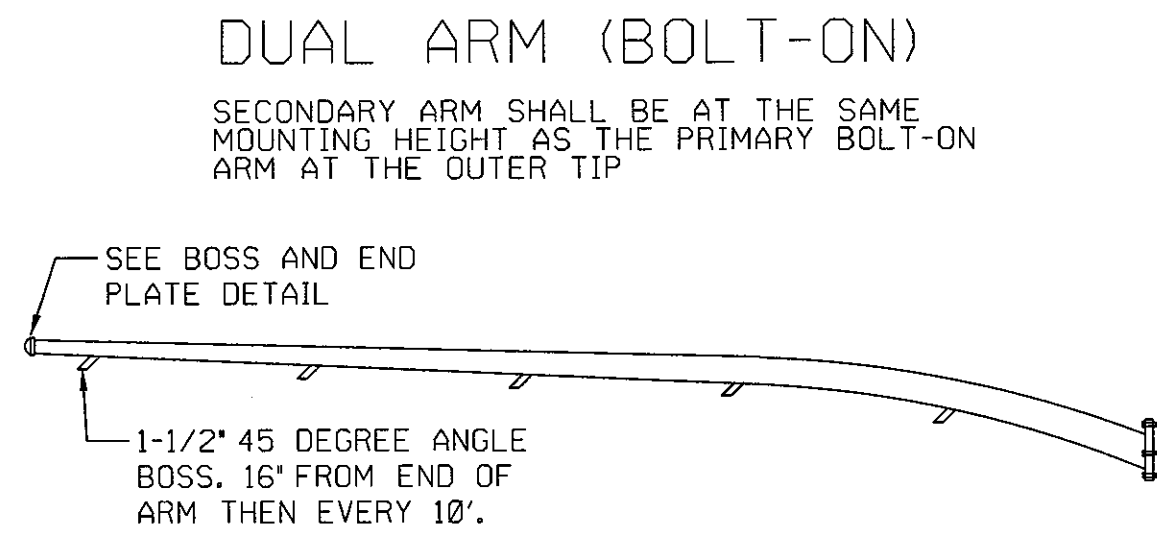
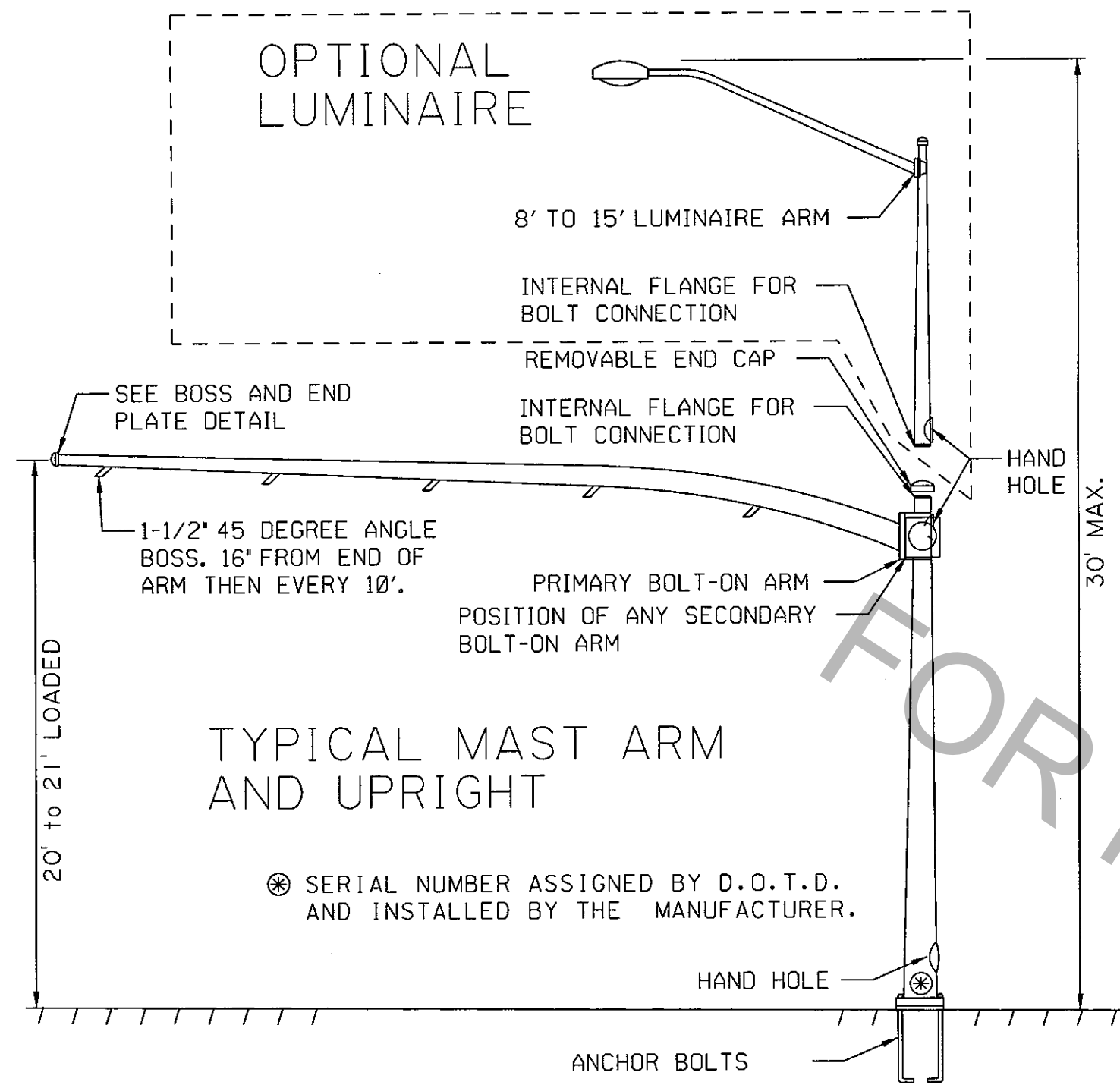
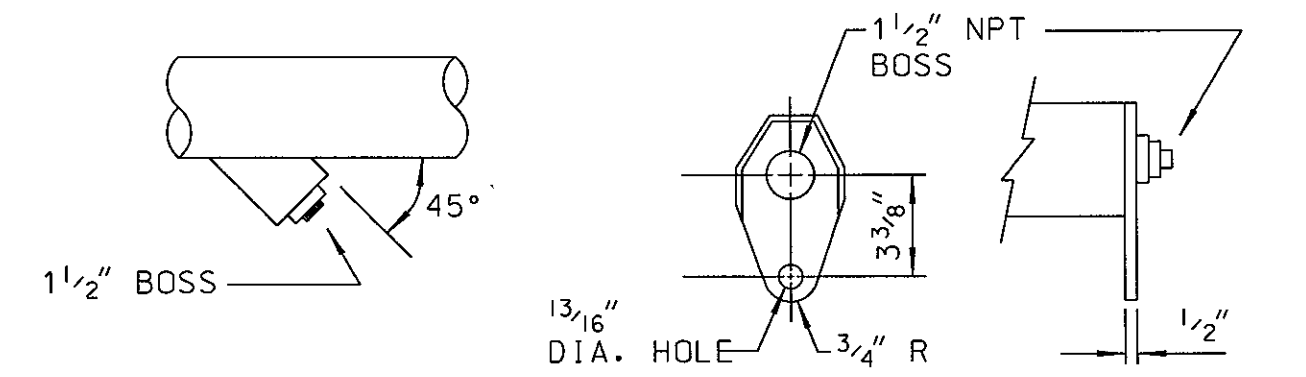


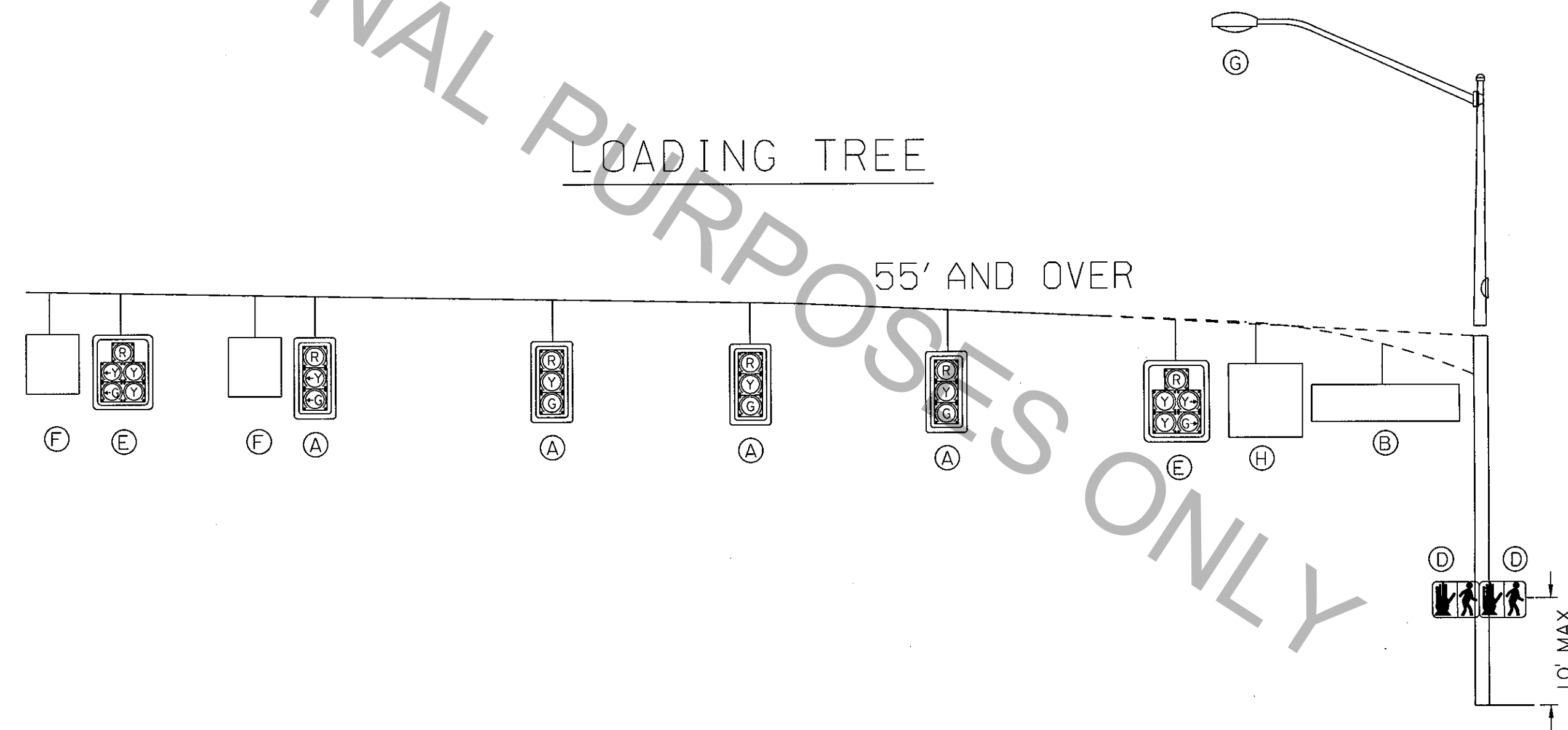
55' SINGLE, 50' X 35' DUAL, AND OVER MAST ARM DETAIL



BOSS AND END PLATE DETAIL



- NOTE:
1. ALL BOSSES SHALL BE PLUGGED WITH A 1 1/2" GALVANIZED STEEL CONDUIT PLUG WITH A SQUARE HEAD HDG. WHEN CABLE IS ROUTED THROUGH THE BOSS A RUBBER COMPRESSION BUSHING SHALL BE USED TO SEAL AND HOLD CABLE IN BOSS. CABLE SHALL BE SECURED TO MAST ARM FROM BOSS TO SIGNAL HEAD WITH 1/2" WIDE WEATHER RESISTANT TIE WRAPS.
  2. TEN (10) CONDUCTOR SIGNAL CABLE FROM CONTROLLER MAY BE SPLICED IN POLE BASE TO TWO (2) - SIX (6) CONDUCTOR SIGNAL CABLES ROUTED TO TWO (2) - THREE (3) SECTION SIGNAL HEADS ON THE MAST ARM. NO OTHER SPLICING SHALL BE ALLOWED.
  3. ALL SPLICES SHALL BE MADE WITH AN ALL COPPER OPEN-ENDED COMPRESSION SPLICE CAP INSTALLED TO THE MANUFACTURER'S RECOMMENDED METHOD AND INSULATED. (WIRE NUTS SHALL NOT BE ALLOWED)
  4. A 1/2" -13NC GROUND LUG SHALL BE REQUIRED AND BE ACCESSABLE BY THE HAND HOLE.



**MAST ARM DESIGN CRITERIA:**  
 THESE TRAFFIC SIGNAL SUPPORT STRUCTURES SHALL BE DESIGNED IN ACCORDANCE WITH LOADING AND ALLOWABLE STRESS REQUIREMENTS OF 2009 AASHTO "STANDARDS SPECIFICATION FOR STRUCTURAL SUPPORTS FOR HIGHWAY SIGNS, LUMINAIRES AND TRAFFIC SIGNALS", FOURTH EDITION. WIND LOADS ARE BASED ON A BASIC WIND SPEED OF 130 MPH WITH A RECURRENCE INTERVAL OF 50 YEARS AND A FATIGUE CATEGORY OF 2. FATIGUE LOADS ARE BASED ON THE REQUIREMENTS OF SECTION 11.7 AND THE FOLLOWING DESIGN LOADS.

- \* VORTEX SHEDDING: NOT APPLICABLE FOR STRUCTURES WITH A TAPER OF AT LEAST 0.14"/FT. PER AASHTO.
- \* NATURAL WIND GUSTS: THE YEARLY MEAN WIND SPEED FOR NATURAL WIND GUSTS WILL BE ASSUMED TO BE 11.2 MPH.
- \* GALLOPING: STRUCTURES ARE NOT DESIGNED TO RESIST PERIODIC GALLOPING FORCES.
- \* TRUCK-INDUCED GUST: STRUCTURES ARE NOT DESIGNED TO INCLUDE TRUCK-INDUCED GUSTS.
- \* ARMS MAY BE CURVED OR STRAIGHT.

NOTE:  
 ① EFFECTIVE PROJECTED AREA

DEVICE	DESCRIPTION	PROJ AREA (SQ. FT)	WEIGHT (LBS)
A) SIGNAL	12"-3 SEC. SIGNAL W/BACKPLATES	10.40 (1)	56
B) SIGN	72" X 18" STREET NAME SIGN	9.00	36
C) SIGNAL	12"-3 SEC SIGNAL HEAD NO BACKPLATE	4.90 (1)	50
D) SIGNAL	DUAL 2 SECTION PEDESTRIAN SIGNAL	8.00 (1)	80
E) SIGNAL	12"-5 SEC SIGNAL WITH BACKPLATES	16.00 (1)	85
F) SIGN	24" X 30" REGULATORY SIGN	5.00	20
G) LUMINAIRE	LUMINAIRE	3.30	75
H) SIGN	36" X 36" BLANK OUT REGULATORY SIGN (40" X 40" OVERALL)	11.20	94
I) SIGN	30" X 36" REGULATORY SIGN	7.50	30



SHEET NUMBER

PARISH

FEDERAL PROJECT

STATE PROJECT

DESIGNED BY S. MCCARROLL

CHECKED BY D. LORIO

DATE 04/12/2017

REVISION DESCRIPTION

NO.

DATE

BY

REVISION DESCRIPTION

NO.

DATE

BY

TRAFFIC SIGNAL STANDARD DETAILS

55' SINGLE, 50' X 35' DUAL, AND OVER MAST ARM DETAIL

TSD-04

TRAFFIC ENGINEERING