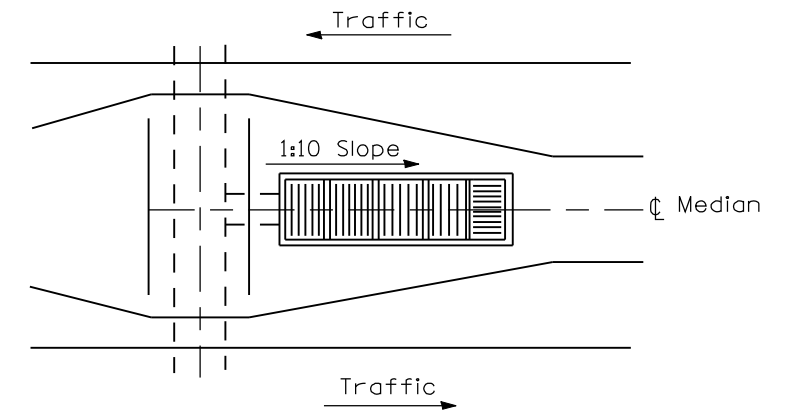
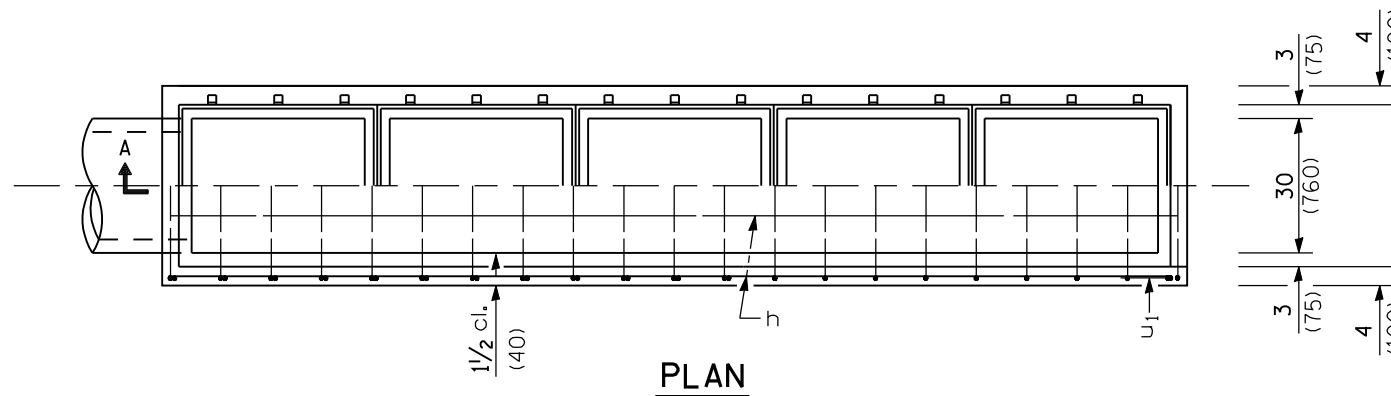


**SECTION A-A**

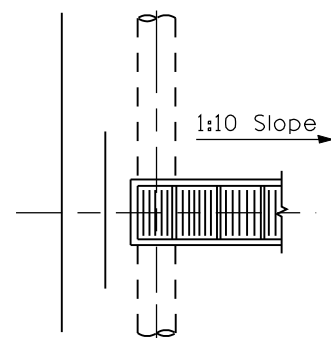
NOTE: Culvert pipe may exit from the side (or sides) by changing reinforcement bars in that area and in the headwall end of box.



Sketch showing location and direction of main bearing bars in relation to  $\phi$  median (showing exit from end)



**PLAN**



Detail showing exit from side (or sides)

**GENERAL NOTES**

If field conditions will permit, bottom of inlet box shall have 2 (50) slope.

All slope ratios are expressed as units of vertical displacement to units of horizontal displacement (V:H).

All dimensions are in inches (millimeters) unless otherwise shown.

DATE	REVISIONS
1-1-09	Switched units to English (metric). Revised General Notes.
1-1-07	Increased depth of f & g. Soft converted metric rebars.

**INLET BOX  
TYPE 24 (600) G**

(Sheet 1 of 2)

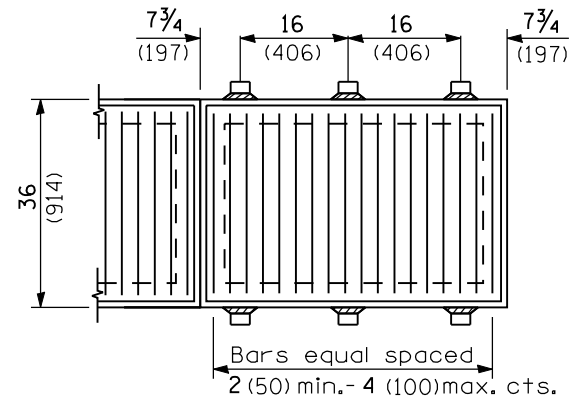
**STANDARD 542531-03**

Illinois Department of Transportation

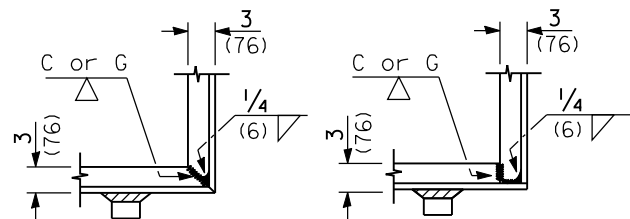
PASSED January 1, 2009  
*Scott Schick*  
 ENGINEER OF POLICY AND PROCEDURES

APPROVED January 1, 2009  
*Ken E. Han*  
 ENGINEER OF DESIGN AND ENVIRONMENT

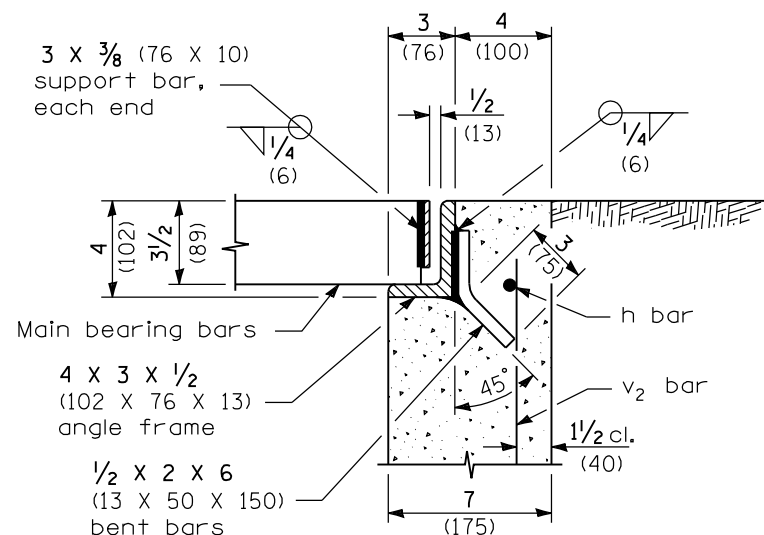
ISSUED 1-1-07



**TYPICAL STEEL GRATING**



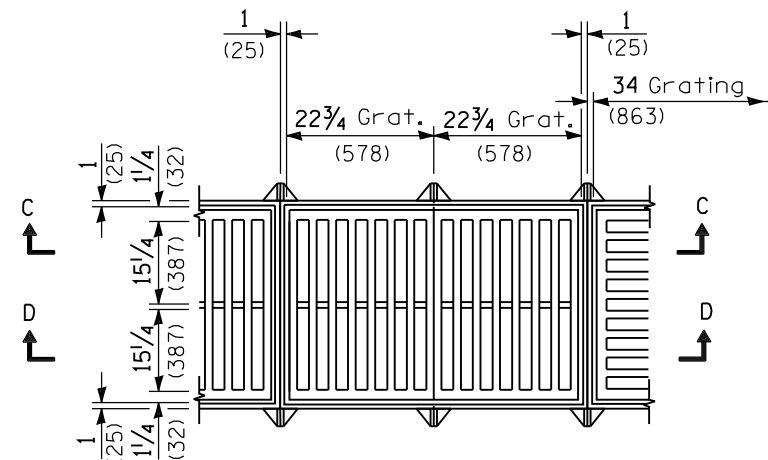
**TYPICAL CORNER of STEEL GRATING FRAME**



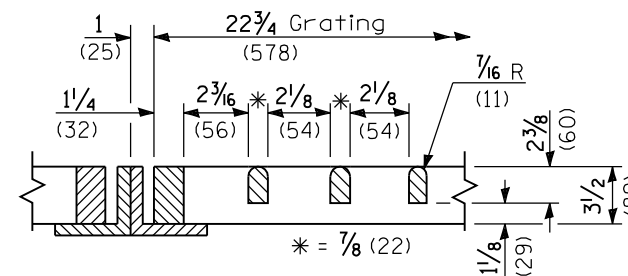
**SECTION B-B**

Material required for one inlet box

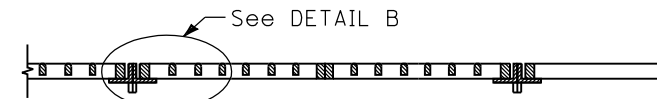
Bar	No.	Size	Length
h	10	No. 4 (No. 13)	20'-0" (6.10 m)
u	17	No. 4 (No. 13)	6'-5" (1.96 m)
u <sub>1</sub>	6	No. 4 (No. 13)	5'-11" (1.80 m)
u <sub>2</sub>	1	No. 4 (No. 13)	5'-6" (1.68 m)
v	2	No. 4 (No. 13)	33 (840)
v <sub>1</sub>	6	No. 4 (No. 13)	30 (760)
v <sub>2</sub>	10	No. 4 (No. 13)	24 (610)
v <sub>3</sub>	10	No. 4 (No. 13)	18 (460)
Concrete		cu. yds. (m <sup>3</sup> )	3.2 (2.45)
Reinf. bars		lbs. (kg)	270 (122)
Grating		sq. ft. (m <sup>2</sup> )	56.0 (5.20)



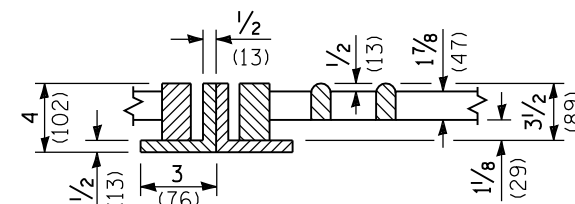
**TYPICAL CAST GRATING**



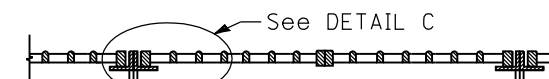
**DETAIL B**



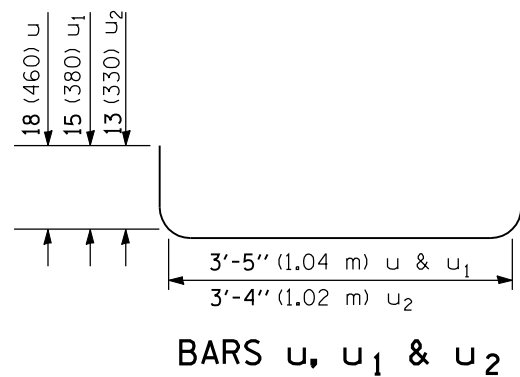
**SECTION C-C**



**DETAIL C**



**SECTION D-D**



**BARS u, u<sub>1</sub> & u<sub>2</sub>**

Illinois Department of Transportation  
 PASSED January 1, 2009  
 ENGINEER OF POLICY AND PROCEDURES  
 APPROVED January 1, 2009  
 ENGINEER OF DESIGN AND ENVIRONMENT

INLET BOX  
 TYPE 24 (600) G  
 (Sheet 2 of 2)  
**STANDARD 542531-03**