

Hilliard Road Bridge - C.R. 69 08.57

Drainage Design Criteria

Design Designation: Urban Minor Arterial
ADT > 9,000

Collection System	
Design Storm Frequency 'L&D Volume 2 (January 2013)	10 year storm (Section 1104.4.1)
Hydraulic Gradient Shall not Exceed 'L&D Volume 2 (January 2013)	rim elevation (25 year storm) (Section 1104.4.2)
Method to Estimate Design Discharge 'L&D Volume 2 (January 2013)	Rational Method (Section 1101.2)
Coefficient of Runoff "C" 'L&D Volume 2 (January 2013)	pavement = .9, berms and slopes = .5-.7 (Table 1101-2)
Minimum Time of Concentration 'L&D Volume 2 (January 2013)	10 minutes (Section 1104.4.4)
Desirable Minimum Velocity for Design Flow 'L&D Volume 2 (January 2013)	3 ft/sec (Section 1104.2.1)
Minimum Pipe Slope 'L&D Volume 2 (January 2013)	15 degrees (27%) (Section 1103.8)
Inlets	
Design Storm Frequency 'L&D Volume 2 (January 2013)	5 year storm (Section 1103.2)
Maximum Spread of Flow into Traveled Lane 'L&D Volume 2 (January 2013)	8' of through lane (Table 1103-1)
Maximum Depth of Flow at Curb 'L&D Volume 2 (January 2013)	1" below top of curb or 6" abutting parapets (Section 1103.2)
Minimum Gutter Slope 'L&D Volume 2 (January 2013)	0.3% (Section 1103.1)